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Issue 5 • June 1997

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We can fit any of the advertised products
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Please ring for an appointment before
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Exchange data easily with other
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ATARI MEMORY

STe / Mega STe	STFM MARPET
1/2meg.....£10.00	1/2meg.....£28.00
2meg.....£26.00	2meg.....£48.00
4meg.....£50.00	4meg.....£72.00

All kits are supplied with comprehensive fitting instructions, testing software and a free disk of useful PD/software utilities. Free technical support is available, as is a competitively priced fitting service.

IDEal STE internal hard drives

This interface mounts inside the computer and allows an internal 2.5" ide drive to connected. Inexpensive 3.5" drives can also be used for people with replacement case systems. Also available with high density controller module, high speed serial port circuit and real time clock. Dry installation with full manuals.

IDE INTERFACE ONLY £59.99

64MB drive and interface £99.00

160MB drive and interface £124.00

340MB drive and interface £149.00

720MB drive and interface £184.00

Add £30.00 to above prices if high density, serial port and clock modules are required

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Full of IDEals

The Upgrade Shop (TUS) developers of innovative hardware for the PC have just developed an IDE interface for the 512- and 1GB drives as generally cheaper than the SCSI variety (the common type used with PCs). This is an exciting development as it means money spent on hard drives can go even further.

TUS are offering full prices include the interface but exclude the standard rate for listing: 68MB drive for \$99, 1GB drive for \$129, 320MB for \$149 and 720MB for \$199.

All drives are internal and fit inside a standard 3.5" case. They also offer an external 3-GB external hard drive system for \$299.

For: The Upgrade Shop, Unit 16, Victoria House, Cross Street, Macclesfield, Cheshire SK10 7PS
Tel: +44 (0)1625 509445

Hard drive adapters

If you want to replace a 2.5" drive with a 3.5" drive, the Falcon T140 can provide an adapter for which plugs into the Falcon to allow 3.5" drives to be connected. The adapters are best suited for personal machines, but it is possible to fit a 3.5" drive into a standard Falcon case by cutting away some of the top metal shielding. Instructions are included. Each adapter costs \$9.95 plus \$1.99 carriage in the UK. T140s also stock a range of 2.5" IDE and SCSI hard drives. Sites: Datasoft/Black Knight Software.

UK: +44 (0)121 450 6648
Fax: +44 (0)121 414 1628
Email: 198445.1256@compuserve.com
URL: <http://www.worldcompuserve.com/~datasoft/T140.htm>
Internet: T140@UK
4 Whitford Way, Holly Oak, Buntingford, Cambs CB24 4AG, England

Italian offers

The APX series of art and animation software has been revised and updated. APX Media and Video v2.3 both now support 16-bit/640 TrueColor display as a VGA monitor which can be achieved using ThinkPad or Neoscan system accelerator. Both APX Media and Video are supplied

with the same 748 page manual and master disks.

The following prices include VAT but carriage costs extra to please do get in touch before placing orders. APX Media v2.3 has been reduced to \$79.95 - a saving of nearly \$20. UK carriage is free.

APX Video v2.3 has been reduced to \$29.95 with free UK carriage.



Upgrade between versions v2.1 and v2.3 will be available between the two programs and includes package - so APX Media can be upgraded to APX Media for \$20.

There are also offering a 'Power Pack bundle' for \$99.95 comprising:

- APX Media (\$79.95)
- Neoscan system accelerator (\$29.95)
- Video system accelerator (\$14.95)

Second thoughts

www.colson.co.uk



The Thought! Idea Processor has also been reduced from \$79.95 to \$49.95.

Thought! is a design program which at this reduced price should attract the attention it deserves. Includes comprehensive 186 page manual and master disks.

Falcon rescue

There are currently looking for second hand Falcons to refurbish and sell back into the market to keep the maximum number of Falcon machines in circulation so if you have a spare Falcon you know what to sell.

Calamus SL Plug In Power!

Computer Direct have acquired English language distribution and translation rights for over 80 Plug In Power Modules for Calamus SL. The first English release - originally programmed in German by Adequato Systems GmbH - are available now.

- 4 GB to True Adobe Postscript Level 3 output drivers. Ideal for output documents that require services can handle.
- Adobe 3-post editor - 1 line reliable alternative to PSE Writing which offers many enhanced features.

Over the next few months Computer Direct will be working hard on a range of modules and drivers including:

- Print Merge and Filter modules. These allow you to apply effects normally associated with high end image editing packages within Calamus documents.
- Four Data in coming module which displays low quality images on-screen then swaps them for the original high quality images at print time making the best use of available system resources.
- A Calamus NV20 printer driver which allows you to print via PDI, in the ideal solution for MagiWin/PC users.
- Holdings is a complete set of maps and guides designed to take the user to all of the various complex templates.
- A driver to use the Wacom 52 Pad (pressure sensitive tablet).
- From International Calipso is a module which enables Calamus to import and edit Adobe Postscript Level 1 data both EPS and PS files can be imported. For example, EPS art from Adobe Illustrator can be opened and edited within Calamus. PS files created from Quark Express or Adobe PageMaker etc. can be opened viewed and edited right within Calamus SL.

Oh! IT Goes!

Now you can build your own super fast Direct16 or DirectVGA Atari TT clones from kits.

At the heart of every DirectVGA or Direct16 is a custom motherboard. This system is designed to conform to the worldwide ATX Form Factor standard which means you can use any standard PC case.

A motherboard kit includes a motherboard with a pre-installed, tested and trained on CPU along with all necessary cabling.

You can select from a 66MHz i486/486 or the ultimate Motorola CPU - a 133 MHz 68040. i486/486.

Add your choice of standard PC compatible components including PC keyboard, floppy drive, IDE or SCSI hard drive, 72 pin memory i486 and an ISA or PCI graphics card and plug in any Atari mouse and away you go. Plug and Play... not Plug and Pray!

DirectVGA kits start from \$1729. Canadian pricing \$188.

Approximately \$700-84000 US,
subject to exchange rate
fluctuations). Canadian
residents add 7% GST.
Tel: +44 (0)1404 569544
Fax: +44 (0)1404 569544
Email: info@compdirect.com
URL: <http://compdirect.com>
Computer Direct, 00020-00 Avenue,
Edmonton, Alberta, T6H 1E6,
Canada

UK Distribution:

The Ultramax products should be
available in the UK from Image
Applications
Tel: +44 (0)1404 569544
Fax: +44 (0)1404 569544
E-mail: ukinfo@compdirect.com
Unit 1, Wellesley House, Welwyn Garden
Road, Welwyn, Herts, SG14 7NL, UK

Nabuc 48 MBit port kit

Nabuc 48 is a serial modem MIDI
port expander with 6 provisions three
extra MIDI ports. Features include:

- Three extra MIDI ports for your
Atari! It makes a total of 64 MIDI
channels available - which works
out at less than \$10 per channel!
- Equipped with MIDI5 driver for
Seimens CUBASE and simulates
Bayer for EmuPro/CLAB
- Protected motor
- Available to learn all items which
expanses working. Ideal for
building into PC or multi-cases de-
signed in a year or more choice
- Nabuc is powered from any 5V
supply such as a 7V PP3 battery or
via the laptop's port

Nabuc is MIDI Future compatible
Payment by credit card or cheque
accepted. prices as follows:
• UK: £179.00
• International: £199.00
• VBP: £230
• Get you working! service for all
problems: £15
• System power option \$1

Manufacturer: Info Tech Technology Ltd,
PO Box 1007, Sandus, SE25 0SE, England
Tel: +44 (0)1404 569544
Fax: +44 (0)1404 569544
Email: info@info-tech.com
URL: <http://www.info-tech.com/>
info@info-tech.com

WebSpace now Web.Suite

WebSpace, the web browser reader
developed by Gap Computers has
now been renamed to Web.Suite and
includes PPP Link, a TCP/IP client
which supports PPP adding on-line
browsing capabilities for the first time
(demo v1). It's available for
download from their webpages which
allows utilitarian file based browsing.

Currently Web.Suite doesn't support
images or image maps and is still
working towards full HTML 3.2
compliance. (XXX) claims Web.Suite is



between two and four hours faster than
its competitors! Obviously as UK
distribution has been announced:
Tel: +44 (0)1404 569544
Email: info@info-tech.com
URL: <http://www.info-tech.com>
850 General, 1, Rue des Varennes,
93440, La Courneuve, France

MS AtariPort

This site at AtariPort is the United
States will take place in Indianapolis
Indiana, USA, in its usual slot of the
last Saturday in July on July 26th 1997.
It is called the Mid-Indiana MSRT
AtariPort UK and is organized for the
month year in attendance by three
user groups: Atari ST Computers in
Indianapolis (ASCI), Birmingham to
Atari ST users (BS-AST) and Purdue
Atari User Group (PAUG).

This year's location is the Post Road
Community Center, 1005 Post Road in
the south eastern quarter of the city
about halfway between Interstate
Highway 70 and Interstate Highway 74.
Table prices this year cost only \$30
for residents and \$5 for individuals.
Admission costs \$1 in exchange for
which you might even get some free
soft drinks and snacks. For more
information, contact:
Charles Beatz
Email: charles@atariport.com or write to us
Tel: +617 545 4429

Craft Soft

ATARI Times

The Atari Times disk magazine is now
your old. To celebrate a Craft Soft
revisited Atari Times 5 on 16th May
1997. It's their biggest new issue and
includes contributions from Matt Hays,
Doug Richardson, Spawert, Ashby
teachware, Robert Goldstein and
others.
Tel: +44 (0)1404 569544
Email: info@info-tech.com
SSE and Soft in Atari Times, etc.
Celia Polonsky, The Craft Shop
84, Millway, St Yves, Bristol, BS7 7LN,
England
<http://www.craftsoft.co.uk/polsonsky/>

Snippets

CyberSlider on the move

CyberSlider a contact point for
specimens, experiments and online has
changed and is immediate effect.
Any long addressed to the old
address will still be forwarded for
several months so can send to post.
If you've just joined a registration,
Post: CyberSlider, PO Box 2024,
Bristol BS16 3DE, UK
Email: info@cyberslider.org
or webmaster@cyberslider.org
URL: <http://www.cyberslider.org>

Atari Computing on TV!

Thanks to Donald Duff, Atari
Computing got a brief moment of
free prime time TV advertising on
the Scottish Television "Tonight
Today" programme.
Donald was being interviewed
about television arrival and left a
copy of Atari Computing presented &
displayed while the cameras were
on. He was then asked to give a
WWF dress and you can guess
which page he showed the camera.

RFC website

Radio Free Computers, RFC Software
have a new website address
URL: <http://www.rfc.co.uk/>

Virus sighted!



In ASCII Richard Richardson article
written as to look and for a new
virus spread via the COMPROM 2P
file. The kind of Pory CD-ROM
contains a copy of this virus on the
directory TOAD-NESDUP, so if
you own a copy of this CD please be
careful not to infect your disks or
format it to other users.



"New! Games! Why not..."
as everyone is on the
verge - send it to us at Atari
Computing, "Rise of the
Overlord"
Johnstone, PAF 810
SCOTLAND, South
Aberdeen, Scotland
or info@atari.com

Goodman's

Atari Update

Prospero C Language Set

19.95

Includes, C Language, C Library, AES & VDI Bindings, complete with four individual manuals

Word Extract

6.95

For all Word Puzzle Fans. This is the full version on four disks. Find anagrams, palindromes, extract words etc

Prospero Developers Kit

19.95

Includes K Resource, Comprehensive Manual, Developers Workbench, 68000 Macro Assembler, etc.

GAMES & PROGRAMS	Cost
Video Loans	1.95
5 volumes of Images	1.95
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More Backgrounds	3.95
Destruction Incorporated	9.95

CD-ROMS	Cost
Hyperquest II	4.95
Graphic Art Tutor	9.95
3000net	9.95
Editor Paint	9.95
Techniques Designer	24.95

MISCELLANEOUS	Cost
ATI reference book	9.95
Acrobat/More Extensions	3.95
2500 Software Upgrade	9.95
Techniques Mouse Mat	1.95
10 meg STX Upgrade	4.95



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the Atari Reference Guide

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This comprehensive new printed guide to all the software from Atari 1984 to the present

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ATARI

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Subscription	UK	EUROPE	USA	OTHER
3 issues magazine only	£ 9.00 <input type="checkbox"/>	\$11.50 <input type="checkbox"/>	\$20.00 <input type="checkbox"/>	\$12.00 <input type="checkbox"/>
3 issues with Reader Disk	£25.00 <input type="checkbox"/>	\$17.50 <input type="checkbox"/>	\$19.00 <input type="checkbox"/>	\$19.00 <input type="checkbox"/>
6 issues magazine only	£18.00 <input type="checkbox"/>	\$23.00 <input type="checkbox"/>	\$34.00 <input type="checkbox"/>	\$26.00 <input type="checkbox"/>
6 issues with Reader Disk	£26.00 <input type="checkbox"/>	\$25.00 <input type="checkbox"/>	\$26.00 <input type="checkbox"/>	\$26.00 <input type="checkbox"/>

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reprints written on
plain paper are
acceptable

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I enclose a cheque/postal order (UK only), Sterling Eurocheque/Post Office payment (Europe), Sterling Post Office Payment/International Money Order (Commonwealth) or an International Money Order (Rest of world) for £ _____ Please make all funds payable to the "Atari Computing Group"

Data Protection Act 1984: I consent to The Atari Computing Group holding up subscription received on computer. I also consent to this information being disclosed to other members of The Atari Computing Group. I understand my entry is available for inspection under the provisions of the UK Data Protection Act 1984.

Signature _____ Date _____

Return this form with payment to: Atari Computing (Subscriptions), 73 Westside Drive, TROCKEN, Ayrshire, KA10 6BZ (Scotland), United Kingdom

READER DISKS

Reader disks are now available, on an issue-by-issue basis for just £3.50 (including all UK post and packing), \$9.75 (Europe) and \$3.00 (Rest of World).

Please make all funds payable to the "Atari Computing Group" and send orders to: Atari Computing, Reader Disk Order, "Roku Blaster", Orkney Crescent, Johnston, PA2 6LR, SCOTLAND



UK: £3.50 per copy (incl. order)
Europe: Sterling Eurocheque/Post office payment
Commonwealth: Sterling Post Office Payment/International Money Order
Rest of world: International Money Order

If your copy of Atari Computing is delivered from one of our distributors please obtain your Reader Disk from them.

EDITH PRO OFFER

Now available direct from
Atari Computing!

Following our inclusion of *Edith Pro* the experimental and fully featured text editor on our Reader Disk we can now supply the official 70 page, coach bound A4 manual and labelled master disk for just \$12.50 (including UK postage and package). Contact us for postage costs outside UK.

Read all about this excellent program in the guest text editor review in issue 4 of Atari Computing where it received a sparkling recommendation from our panel of experts.

\$12.50



Send your cheque (payable to Atari Computing) to: Atari Computing, "Roku Blaster", Orkney Crescent, Johnston, PA2 6LR, Scotland or to include your address.

Use the source...



Sixteen months ago, in all the *For Dummies* titles, last year, it seems every day the online and publisher is producing books on the subject whether it be two days in the HTML language, one management guide or manual on general design issues. Well, the authors in your local bookshop pointing under the weight of this online library, it is not easy to locate something which is useful to any webpage designer regardless of computer platform.

The HTML Sourcebook: A Complete Guide to HTML 3.0 by Ian S. Graham aims to be such a thing. Most HTML cybooks launched in the last six months are either heavily platform-dependent, and assume you're using the PC, or state of the art, or they're generalised, the current multimedia explosion making it useless as a reference, a plug-in to help or languages for Java. The four books don't take that route. Instead, Graham takes the traditional old paper as one of the most complete overviews of the basic HTML language I've yet seen.

Standards

The use of the term HTML 3.0 in the title is a bit misleading, though HTML itself is a rapidly evolving language. The last officially ratified standard was 2.0 and HTML will currently keep discussing HTML 3.0 as a fairly basic language, leaving all provisions for the extension elements that either in books which you see across the web every day. Graham's 30 chapters includes the old language, adapting most of the third party enhancements into languages like Netscape including tables.

If you've tried and failed to create HTML pages from our tutorials, you could do with a good book. Frank Charlton looks at a possible contender...

Ignoring the version 3 stuff, explanations and the like, which is largely unimportant at the moment, the Sourcebook is actually an extremely good reference to the HTML language, both in its basic and advanced areas. The structure of the book you're most likely to return to, at the extensive HTML, numerous references. Rather than being a dry list of HTML tags, this instead explains the elements of the language in a logical way, and includes lots of practical examples. The extensive explanation

explains clearly and offers concrete advice on where and when to use each one. An excellent index means you'll be able to flip straight to the page you need with a minimum of fuss.

Laying the table

Beyond the basic HTML features, the Sourcebook goes into detail where explaining additions to the language from the likes of Netscape. Elements like tables feature coloured or image backgrounds and enhanced text alignment, and you can use all of these within HTML. Table handling is one of the most complicated aspects of HTML, and one where this book really does the job, covering tables in well-organised and with a little practice you'll soon be producing your own striking table layouts.

As well as covering the language itself, Graham offers a useful chapter with the planning and structure of your webpage. Beyond that is standard words

reading. Graham's advice on structuring your site is very good and following a logical plan before you start can often save a lot of problems when you come to update or add pages later. This entry with authors also straight into the nitty gritty of producing pages without much thought to the overall structure of the site, and it often shows where other books to explore. A few hours' planning ahead in a suitable way and the Sourcebook offers some solid advice.

The section dealing with the HTML 3 standard features like tables and addresses including the Java language don't hold much interest for those of us producing pages to be viewed with IEAB, though. Unless you're intent on producing a site for PC, Mac or IBM users, and have access to one of these platforms, this portion of the book is largely useless. Graham also provides clear sections dealing with writing CGI scripts in languages like Perl, which is instead available for the start. Unless you're producing pages for online use with an Internet Provider willing to let you make use of your own, and a list where you won't find much of interest here. Also covered are fonts and tags for including video and audio objects.

Take your pick

The HTML Sourcebook is an excellent volume. The explanation of the language itself is both clear and readable, and easy to flip into when needed. A brief look at the current crop of the market titles shows that this is where new books HTML are for novices, possible, or technical, better with PC/IBM/IBM standard, and correspondingly lightweight price tags. The Sourcebook fits easily in to between, it's a good starting point for new learners, and a very useful reference for those of us who have already begun to explore the language. Well worth looking at. **D**

4. Call supports almost all of the current enhancements to HTML, so there's nothing to stop you producing colourful pages.



HTML SOURCEBOOK

Publisher

Wiley Computer Publishing
<http://www.wiley.com/comput/books/>
 RRP: £24.95

Pros

Easy to read, well focused, excellent reference

Cons

Would be better as a stag lineal volume

80%

Build Your Own! TT Clone!



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- 1 VME Slot
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Yes! Now you can build your own super fast Direct40 or DirectT60 Asat! TT clone using our simple to install kits. We make it easy for you!

The heart of every Direct40 or DirectT60 is the custom mother board. This ultra modern system is designed to conform to the worldwide ATX Form Factor standard unlike by the PC standard or so. This means that it fits into any standard low cost PC style tower or desktop case. Go ahead, pick a case any day!

Our kits are so simple to build!

As a minimum, we supply you with all of the cabling needed and a motherboard with a pre installed, tested and burned in CPU. Choose from the super fast 66MHz MC68040 or the ultimate Motorola CPU, the super-scalar L20 MIPS 68040 MC68040!

Simply add any standard PC keyboard, floppy drive, IDE or SCSI hard drive, 72 pin memory SIMMS and an ISA or PCI Graphics Card of your choice! * Plug in your favourite Asat! mouse and Play! Truly Plug and Play, not Pray! All of these peripherals are readily available at a low cost from any PC store!

Go-Configure!

Direct 40 & DirectT60 D.I.Y. Kits UK £799 ■ \$1299 US ■ \$1799 CDN.

DirectT60 Motherboards, CPU and Cabling are extra to list price...

Monitor, Keyboard, Installed and Tested CPU and Complete Internal Cabling Set

Item	EUR	US \$	CDN \$
DirectT60 66MHz			
58 68040	759	1299	1799
DirectT60 66MHz L20 MC68040	999	1599	2199

The 40 Slots Formatted Set Up and Tested

Item	EUR	US \$	CDN \$
1 x 27" CRT	149	219	299
1 x 27" CRT	149	219	299
1 x 27" CRT	177	249	349
1 x 27" CRT	177	249	349
2 x 27" CRT	198	289	409

PCI Bus Graphics Cards

Item	EUR	US \$	CDN \$
ET4000 1 MB	39	49	69
ET4000 2 MB	79	99	149
ET4000 3 MB	99	149	199
ET4000 4 MB	75	129	169
ET4000 2 MB	138	209	289
ET4000 1 MB	179	249	349

Floppy Drives 5 1/4" 360K High Density

Item	EUR	US \$	CDN \$
Generic Brand	33	41	59
Premium Brand	17	25	39

1 x 72 Pin Memory 32660 68040

Item	EUR	US \$	CDN \$
4 MB	22	35	49
8 MB	31	49	69
16 MB	57	93	129
32 MB	111	189	249
64 MB	211	349	499
128 MB	399	649	899

AT Style Keyboards

Item	EUR	US \$	CDN \$
1 x 1 Key Generic	17	25	39
Fujitsu Premium	26	43	59
Ergonomic Pro	44	69	99

Asat! Compatible Mice

Item	EUR	US \$	CDN \$
Optical Mechanical	17	25	39
Wired 500 DPI	44	69	99
33 Opt 5-4	11	19	29

US/UK Approved Cases Suitable for North American customers only

Item	EUR	CDN \$
Mini Tower Desktop Case with 240W P/S	63	89
Mini Tower 200W P/S	59	89
Full Size 240W P/S	89	129

DirectT60 Software Bundle Includes:
Operating System, Graphics Card Drivers, HD Drivers and special utilities to get the most out of your Direct40 or DirectT60. Select the DirectT60 software bundle based on the Graphics Card you are using.

Item	EUR	US \$	CDN \$
For ET4000	133	217	299
For ET4000	155	253	349
For AT-Mech 54	177	289	399

The complete kit includes all the hardware and software to get you started. It also includes a copy of the DirectT60 software bundle. The software bundle includes a copy of the DirectT60 software bundle. The software bundle includes a copy of the DirectT60 software bundle. The software bundle includes a copy of the DirectT60 software bundle.

Look at what is new at Computer Direct!

[illegible]

Link 97	F.A.D. Audio	Afterburner	sixTT-RAM
<p>SCSI Host Adaptor!</p> <p>The Link 97 SCSI adaptor is one of the cheapest SCSI cards at \$199.95, and it offers the best bang for the buck. It supports a full range of SCSI devices, including hard drives, tape drives, scanners, and more. It's also compatible with the latest SCSI standards, so you can upgrade your system without having to replace the card.</p> <p>\$199.95 \$199.95</p>	<p>Full-Range Audio I/O!</p> <p>The F.A.D. Audio card is a full-range audio card that offers a wide range of features. It includes a built-in mixer, a 16-bit ADC/DAC, and a variety of input/output options. It's also compatible with the latest audio standards, so you can enjoy the best sound quality.</p> <p>\$299.95 \$299.95</p>	<p>68040 CPU For Power!</p> <p>The Afterburner card is a 68040 CPU card that offers a wide range of features. It includes a built-in cache, a 16-bit ADC/DAC, and a variety of input/output options. It's also compatible with the latest CPU standards, so you can enjoy the best performance.</p> <p>\$599.95 \$599.95</p>	<p>Up to 64MB of RAM!</p> <p>The sixTT-RAM card is a 64MB RAM card that offers a wide range of features. It includes a built-in cache, a 16-bit ADC/DAC, and a variety of input/output options. It's also compatible with the latest RAM standards, so you can enjoy the best performance.</p> <p>\$199.95 \$199.95</p>



Computer Direct

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Tel: 403-496-7488 Fax: 403-496-7489

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Power Up

It's pedal to the metal time with Scruming Lai as your demon driver...

If you're in search of some adrenaline-fueled action between Grand Prix and Indy, you'll certainly think out this one is drawn from NASCAR's. Power Up is essentially a Super Sprint chase. In the modern angle, with a big scrolling playfield like *Demolition Derby* and *Super Cars*.

There are two distinct modes of play:

- **Singleplayer** runs against other cars in track within a qualifying position.

They can also be played by two players on a light action display.

- **Two mode** where two players share a screen. If one player laps or is behind they would be dropped off screen, a primary point is lowered and the computer repositioned the two cars to an equal position and the race commences.

Leading is a far pricier item on an N/A. However, the main problem in the players cars move right in the edge of the screen when driving at top speed, instead of remaining centered. This is a necessity when playing in start mode but is otherwise inappropriate. Because there is no chance to anticipate any hazards that may be ahead.



A leader will have taken a wrong turning into the local industrial estate.

It's time to stop for tea and cakes in a snowed light.



Each of the five has a personality reflecting the various themes, such as desert and snow. The personality play an important role because car handling varies accordingly. If the supplied tracks aren't challenging enough, or you're mastered them all you can design your own! Using the track editor you've constructed from usually random circuits to further your freedom.

Scruming Power Up suggests all Atari machines including the TT, with options to use whatever hardware drivers are available, including DMA, stereo sound and more chips. There's even support for up to five different sound cartridges for play music. All these options are controlled from single menus accessed directly from the title screen.

Power Up gets a thumbs up for being hard but available, easily still a really unusual combination Atari game software. With most be disabled because, according to the authors, a bug in PVR3 causes a conflict. Power Up also runs happily from

ST medium resolution, although the track editor needs a bit of low to between 640x480 to 1024x768 resolution while score board enlarges the just one more go.



It finally drives need not apply.

It's a box not in there where's the control?

symptoms and rarely boards off a good value for money package. Power Up doesn't scratch the hardware which is probably only apparent in future editions but in this instance the actual speed isn't an aspect as for graphics.

POWER UP

Publisher

MC & B (Excel) Ltd
Excel, Kent, Maidstone TN11 9PL of Kent
Tel: 0462 65471 683

Distribution, UK

Scruming P.O. Box 113, Aldenham
Bropark, W.C. AM4 9LJ
Tel: 045 2334 2334
Excel, distributed worldwide in UK
Cost: £12 + P&P (£3.00 UK,
£3.50 EU)

Australia, NZ and Overseas

Auditory Units
Excel, at: 1/100/100/100
000 000 000 000

USA

Systems For Tomorrow
Excel
excelsystems@for-tomorrow.com

Requires

App. Atari 10M memory 320x200
resolution (ST level) Personal
optional

Price

Priority of depth and variety, sampled
sound

Case

Can't see much beyond the front
burger when driving fast

Rating

Graphics: 400
Sound: 800
Control: 100

85%

System Solutions

mouse

Shuming Lai invites you to a mouse party...

SYS SOLUTIONS

Shiuming Lai invites
you to a mouse party.

Replacement Atlas
don't see all three
the cover by their
depts. and those which
do appear are often not
much of an
improvement over the
standard Atlas model.

System Integrators have attempted to reduce the hardware risk by using specially-commissioned designs made to the customer's specifications. It has been

The ergonomic shape fits the contour of my hand well, and it feels comfortable in use and in contact with the screen. The buttons

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North American and other parts of the world, it is possible



both light and temperature in operation. A green coat lead in attached seal with a black of a switch in can be used on an Acrylic Acrylic concerned with details will notice the System Technology logo emblazoned on the top and the mounting flange on the bottom.

PARX M4E SYSTEM AND THE CASIO QV DIGITAL CAMERAS

After reading our L3 Steel PWR, software tool recently added a new Mold-Plugging (MP) module based on our digital camera (L44) from Elm I hoped this tool would and downloaded the entire 16-page MP module collection from Coast Steel and after

installing the FAXS system. Under some circumstances, printer drivers and fonts (a "lite" version of IBM FAXS owners will be required) and package(s) will be readily in the handling house. Cables connect. Also.

The Cinema DV digital camera can take up to 64 images at 4,000,000 resolution and operate at shutter speeds between 1/8 and 1/6000 second. Images can be viewed instantly on the 4.3-inch LCD display or via the video output on any TV. Connection to computer is via a serial interface and FireWire, making the entire



and software package for IBM iSeries
Pronto, version 6.01.

Other FARE modules interface with scanners and colour printers including the Epson, Canon, Hewlett-Packard and Fargo ranges. FARE is one company worth keeping an eye on.

1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010, 2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2019, 2020, 2021, 2022, 2023, 2024, 2025, 2026, 2027, 2028, 2029, 2030, 2031, 2032, 2033, 2034, 2035, 2036, 2037, 2038, 2039, 2040, 2041, 2042, 2043, 2044, 2045, 2046, 2047, 2048, 2049, 2050, 2051, 2052, 2053, 2054, 2055, 2056, 2057, 2058, 2059, 2060, 2061, 2062, 2063, 2064, 2065, 2066, 2067, 2068, 2069, 2070, 2071, 2072, 2073, 2074, 2075, 2076, 2077, 2078, 2079, 2080, 2081, 2082, 2083, 2084, 2085, 2086, 2087, 2088, 2089, 2090, 2091, 2092, 2093, 2094, 2095, 2096, 2097, 2098, 2099, 2100, 2101, 2102, 2103, 2104, 2105, 2106, 2107, 2108, 2109, 2110, 2111, 2112, 2113, 2114, 2115, 2116, 2117, 2118, 2119, 2120, 2121, 2122, 2123, 2124, 2125, 2126, 2127, 2128, 2129, 2130, 2131, 2132, 2133, 2134, 2135, 2136, 2137, 2138, 2139, 2140, 2141, 2142, 2143, 2144, 2145, 2146, 2147, 2148, 2149, 2150, 2151, 2152, 2153, 2154, 2155, 2156, 2157, 2158, 2159, 2160, 2161, 2162, 2163, 2164, 2165, 2166, 2167, 2168, 2169, 2170, 2171, 2172, 2173, 2174, 2175, 2176, 2177, 2178, 2179, 2180, 2181, 2182, 2183, 2184, 2185, 2186, 2187, 2188, 2189, 2190, 2191, 2192, 2193, 2194, 2195, 2196, 2197, 2198, 2199, 2200, 2201, 2202, 2203, 2204, 2205, 2206, 2207, 2208, 2209, 2210, 2211, 2212, 2213, 2214, 2215, 2216, 2217, 2218, 2219, 2220, 2221, 2222, 2223, 2224, 2225, 2226, 2227, 2228, 2229, 2230, 2231, 2232, 2233, 2234, 2235, 2236, 2237, 2238, 2239, 2240, 2241, 2242, 2243, 2244, 2245, 2246, 2247, 2248, 2249, 2250, 2251, 2252, 2253, 2254, 2255, 2256, 2257, 2258, 2259, 2260, 2261, 2262, 2263, 2264, 2265, 2266, 2267, 2268, 2269, 2270, 2271, 2272, 2273, 2274, 2275, 2276, 2277, 2278, 2279, 2280, 2281, 2282, 2283, 2284, 2285, 2286, 2287, 2288, 2289, 2290, 2291, 2292, 2293, 2294, 2295, 2296, 2297, 2298, 2299, 2300, 2301, 2302, 2303, 2304, 2305, 2306, 2307, 2308, 2309, 2310, 2311, 2312, 2313, 2314, 2315, 2316, 2317, 2318, 2319, 2320, 2321, 2322, 2323, 2324, 2325, 2326, 2327, 2328, 2329, 2330, 2331, 2332, 2333, 2334, 2335, 2336, 2337, 2338, 2339, 2340, 2341, 2342, 2343, 2344, 2345, 2346, 2347, 2348, 2349, 2350, 2351, 2352, 2353, 2354, 2355, 2356, 2357, 2358, 2359, 2360, 2361, 2362, 2363, 2364, 2365, 2366, 2367, 2368, 2369, 2370, 2371, 2372, 2373, 2374, 2375, 2376, 2377, 2378, 2379, 2380, 2381, 2382, 2383, 2384, 2385, 2386, 2387, 2388, 2389, 2390, 2391, 2392, 2393, 2394, 2395, 2396, 2397, 2398, 2399, 2400, 2401, 2402, 2403, 2404, 2405, 2406, 2407, 2408, 2409, 2410, 2411, 2412, 2413, 2414, 2415, 2416, 2417, 2418, 2419, 2420, 2421, 2422, 2423, 2424, 2425, 2426, 2427, 2428, 2429, 2430, 2431, 2432, 2433, 2434, 2435, 2436, 2437, 2438, 2439, 2440, 2441, 2442, 2443, 2444, 2445, 2446, 2447, 2448, 2449, 2450, 2451, 2452, 2453, 2454, 2455, 2456, 2457, 2458, 2459, 2460, 2461, 2462, 2463, 2464, 2465, 2466, 2467, 2468, 2469, 2470, 2471, 2472, 2473, 2474, 2475, 2476, 2477, 2478, 2479, 2480, 2481, 2482, 2483, 2484, 2485, 2486, 2487, 2488, 2489, 2490, 2491, 2492, 2493, 2494, 2495, 2496, 2497, 2498, 2499, 2500, 2501, 2502, 2503, 2504, 2505, 2506, 2507, 2508, 2509, 2510, 2511, 2512, 2513, 2514, 2515, 2516, 2517, 2518, 2519, 2520, 2521, 2522, 2523, 2524, 2525, 2526, 2527, 2528, 2529, 2530, 2531, 2532, 2533, 2534, 2535, 2536, 2537, 2538, 2539, 2540, 2541, 2542, 2543, 2544, 2545, 2546, 2547, 2548, 2549, 2550, 2551, 2552, 2553, 2554, 2555, 2556, 2557, 2558, 2559, 2560, 2561, 2562, 2563, 2564, 2565, 2566, 2567, 2568, 2569, 2570, 2571, 2572, 2573, 2574, 2575, 2576, 2577, 2578, 2579, 2580, 2581, 2582, 2583, 2584, 2585, 2586, 2587, 2588, 2589, 2590, 2591, 2592, 2593, 2594, 2595, 2596, 2597, 2598, 2599, 2600, 2601, 2602, 2603, 2604, 2605, 2606, 2607, 2608, 2609, 2610, 2611, 2612, 2613, 2614, 2615, 2616, 2617, 2618, 2619, 2620, 2621, 2622, 2623, 2624, 2625, 2626, 2627, 2628, 2629, 2630, 2631, 2632, 2633, 2634, 2635, 2636, 2637, 2638, 2639, 2640, 2641, 2642, 2643, 2644, 2645, 2646, 2647, 2648, 2649, 2650, 2651, 2652, 2653, 2654, 2655, 2656, 2657, 2658, 2659, 2660, 2661, 2662, 2663, 2664, 2665, 2666, 2667, 2668, 2669, 2670, 2671, 2672, 2673, 2674, 2675, 2676, 2677, 2678, 2679, 26

Using the CAM PPM module and Piccolo in TurboC, while on a PicoPC, using Ono images loaded irregularly and the display was comparable to the same images loaded on a PC. All over natural display image loading and display showed to a great extent due to cache, compression.



PARX CASIO GV PACKAGE

Publinter
PACS 54 Rue des Abbesses
97500 PAKA, France
Email: info@publinter.fr
URL: <http://www.publinter.fr>

UK distribution:
In C. N. Jones
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Email: UK-Distribution@cs.cmu.edu

Keywords:
 Adult Adversity, self-help, health, cost, insurance
 insurance, costs

Dr Steve's house of upgrade horrors

In the busy days of summer I decided to add a hard drive to my Mac IIx. After scouring the adverts I settled on a 300Mb drive which included all the necessary leads and software.

After connecting the drive to my IIx I switched on the power and listened to the drive spinning up to its full bearing on the motor and VTL. The computer booted from the hard drive: the driver software recognised the six pre-installed partitions and the drive transported me safely to the standard TOS desktop with one important difference - no extra was for drive C.

It is something like this:


It is this in the last thing you see before you drive stops chugging the wheel the very ahead.

I installed an icon for each of pre-installed partitions, saved the Desktop, installed the Proper Mac Clock and more and Magic then rebooted to load Magic. Next I installed SpeedyDOS 5 using the format program which appeared to use drive but no looking into the folder containing my Speedy hints I found the files were all corrupted! I suspect the SpeedyDOS install program probably didn't get along with Magic so, unfortunately I decided to reformat the drive using the CD-ROM setup program. There were also all only a few files on the drive along with some corrupt loads.

4 Corrupted directories. I've seen a lot of these!

A cautionary tale by Steven Bagley...

The format operation appeared to proceed happily: the drive was making its usual chugging noise but after a while those stopped and the red activity light stayed off! I waited and waited and eventually gave up and switched everything off.

After some lunch I tried again but it still didn't work so I rang the supplier but the repair guy wasn't available and I was told to ring back later.

I waited so I tried formatting the drive one more time and typically it worked this time so I proceeded to partition the drive and re-install my software again - leaving Magic out of the equation just in case. After a while I noticed the corruption again and my heart sank.

Before I ordered the drive I had checked my DMA chip to make sure I didn't have one of the faulty DMA chips labelled C025013-08 so I was confident there was OK.

Found: 1824 K of 800

TEST 800

OK 1

It has months passed before I finally was told.

I connected the hard drive to another 512K/720K i 02 machine to see if I could repeat the problems. I was having with my IIx. Instead I got a new set of problems. Sometimes the drive would load and sometimes it wouldn't.



5 The magical extra drive was I thought for

In desperation I took the drive round to visit my friend's 512K/026 i 04 machine and it dominated and partitioned (by) itself. Believed I re-installed my software and put the episode behind me. Or so I thought. Several days later my MacII message box became corrupt and the whole messily chugging episode came back to haunt me again.

I spoke to my supplier who suggested the Top-Link had a master cable might be faulty so if they sent me a replacement and that seemed to do the trick.

A few weeks later I read a letter which stated DMA chips labelled C025013-08 could also have problems using hard drives. I quickly re-assessed myself I hadn't had any problems since replacing the Top-Link cable but a few days later during a heavy programming session my Mail or

C compiler started to report weird file errors and sure enough they were corrupt. I finally realised I'd been struggling along with a dodgy DMA chip! Since buying the DMA chip replaced several rightmost months ago I haven't had any further trouble but it's a real roller coaster ride I'll never forget! ☹



Two CD or not two CD..?

That is the question Al Gould asks himself as he takes a look at **The Very Best of Atari Inside Volume 1** and **The Ultimate Software - Pakette Collection**...

Both these CD-ROMs contain large numbers of files containing the usual MUI, PUC files and Clipart in various formats to accompany the software, which in both cases consists of hundreds of non-commercial applications and utilities. These CDs are similar to the Atari Forum disks entered in AGN with most of the content stored in German. Although the files are well organized, I did tend to be bored deep inside nested folders. After two happy days browsing through both these CDs I had only just scratched the surface of their contents! Without lengthy documentation I still have no idea what some of the files are for.

After two happy days browsing through both these CDs I had only just scratched the surface of their contents!

The Very Best of Atari Inside is essentially a plain "Reader disk" put together by the German Atari magazine. Atari Inside and it's a try for the larger of the two disks containing



- 900 Calendar Posts
- 800 True Type fonts
- 400 GIFs designed for use on web pages
- 1 MB PAF format mono clipart files (these can be updated using GenView - a copy is included on the CD)
- Massive shareware section although some of the software isn't the latest version (they still make no mention of jumping all post)
- Two share trials to fill up the remaining space - not to say filling but I guess someone will like them

The Ultimate Software - Pakette Collection stored exactly the same content as the Atari Inside CD. For example the 400 GIFs from the Atari Inside CD are included on this CD along with a few more. It is impressed differently with various folders for Pakette STX and TT owners along with general folders. Most of the documentation for both collections is German so a copy of Rultraid - a packet dictionary and some missing classes would all want to be ready!

The big decision

Is either CD worth buying? The answer is yes. It's a cool per file basis the Atari

THE VERY BEST OF ATARI INSIDE VOL. 1

Publisher:
PALKE Verlag Supplier

At address:
1670
Telephone: +49 (0) 634 760766
Fax: 16707666666666
Cost: \$16.99
Total cost: \$56.79 (incl. 17%
VAT) including 15,716 files

Plus:
Atari specific file collection
worth the asking price for the
non-collective alone!

Cons:
Minimal CD room documentation

85%

Inside collection represents the 1-4 value for money but both surface something for everyone and these collectible are a great way to start a library of Public Domain and Shareware programs. Even if some of the programs are out of date it's much easier to track down the latest version of a program than via where what you're looking for.

Finally don't forget much of the software is Shareware so if you find a program worth do register your copy - it's the best way to keep programmers motivated to be better off as you.

DIE ULTIMATE SOFTWARE PAKETTE COLLECTION

Publisher:
MUI & PALKE Verlag

Supplier:
1670
Telephone: +49 (0) 634 760766
Fax: 16707666666666
Cost: \$17.99
Total cost: \$56.79 (incl. 17%
VAT) including 5,140 files

Plus:
Atari specific file collection

Cons:
Minimal CD room documentation

80%



System extensions

Mark Wherry investigates the latest multitasking system extensions...

A text operating system has been patched and extended right, left and centre over the years yet they remain amazingly compact compared with the monstrosities needed to run Windows 95 or System 7, where RAMs of 64MB and 1GB hard drives are considered the bare minimum! However, there are a few nice little features we haven't seen on the Atari platform already and thanks to our German chums programmers can now implement bubble help and object linking.

Lovely Bubbles

Help bubbles are cute little pop-ups which appear when pointing the mouse (or help mouse) over program objects. They can be used to briefly describe the function of the object or offer advice.

Previously, only a few programmers bothered to implement internal routines to achieve the task, most fast help files are not, example which, spring to mind. Now, luckily, there are different options to choose between.

Kolja Kolbelsky, one of the Freeware authors, has written an eCPX (based on Freehand?) called *Trouble Bubble*. This provides a system programmer's (or user's) bubble help facilities (via AES messages - in case you're wondering). However, the downside of this system is memory. The only system capable of running eCPX is a Freehand which may be running in parallel but occupies around 200Kb memory in total - although you get the excellent Freehand file editor and outstanding control panel for your memory as well. On the plus side, Freehand works with TOS, Magic! and Linux.

The real system is Magic! help, programmed by my favourite author, Thomas Much. His system is a small application called 'BubbleGEM' which must also run all the time. Ideally from the Magic! START or APPS folder although it can be launched from the desktop.

Mark likes Thomas Much's bubbles! Wouldn't it be a perfect world if every programmer used them?



You won't automatically get help bubbles unless a program is written to offer them but it only occupies 20Kb memory so its small enough to have installed ready and waiting to spring into action.

Spot the Belemos

We'll have to wait and see but I have a hunch BubbleGEM will manage victorious. Other Magic! extensions have been well supported and already several applications including Cubes II have implemented

BubbleGEM but we'll have to wait and see.

OLGA has ways to make objects talk

Another addition other operating systems offer is object linking. The idea is to improve the relationship between programs in a multitasking environment. Imagine you're running several programs. If you edit an object in one program (for example, an

in .cpl CAB) automatically updates the page display in CAB - very cool!

To achieve this a facility is needed to bridge the gap and handle the communication between programs and this is where Thomas Much comes in. He has again offering his comprehensive solution "OLGA" an acronym which stands for Object Linking for Gerni Applications (another protocol which handles AES messages). OLGA is the Atari version of a standard named OLE (Object Linking and Embedding, originally introduced by Windows and now also used in System 7). Best of all OLGA works under Magic!, Genesis, SMT, MultiTOS and other AES replacements and occupies around 700Kb memory.

If you're wondering how come it's taken so long to reach the Atari platform, OLGA has actually been around since March 1995 and is supported by many German applications. However, the current v1.20 is immensely powerful, available with English documentation and will be integrated into Magic! at v1.1.

To encourage English authors to support OLGA, the best way is to start using it so what is involved? All you

is if you need help get into *Trouble Bubble* (one of the eCPXs included with Freehand) from the (empty) mouse help bubble displayed below left.





I've added SubWinGEM support to my own Windows program (Ed: Better plug what not subtle into my intention, good!) why don't you?

and I've added EMGEM support to my own Windows program (Ed: Better plug what not subtle into my intention, good!) why don't you?

However, it is also possible to configure OLGA as it knows exactly which applications you want to use for individual file types. Let's look at an example: if you're using an OLGA screen application like Kordinsky, you could double-click on an unsupported bitmap image and the OLGA manager would start your chosen raster editor and automatically load the image ready for editing. Any changes saved would automatically be updated to Kordinsky.

To do this you create an ASCII format OLGA.INF file and place it in the same directory as OLGA.APP.

Creating an OLGA.INF file

To set which programs handle for specific file extensions add a line called Extension to the file.

For example, to load BMP files into GEMVIEW add a line like this (Extension must be in all caps):

BMP=VIEW

The dollar sign before GEMVIEW means the path is relative (as opposed to

the real path) so if you have a sub-directory then you can use that path for each entry instead of always having GEMVIEW at the end of the path. You can use as many as you like for multiple file extensions and make sure to use an alias rather than type the full path into each line.

You must use upper case to specify the file extensions and aliases but paths can use a mixture of upper and lower case. After defining all the extensions add a line:

(Type =)

We are now going to define our favourite applications to the individual OLGA application types. This is an any OLGA screen program can use the manager to load up a particular application type. The following types are recognized by OLGA:

- *WP Word processing
- *DP DTP
- *ED Text editor
- *DB Database
- *SS Spreadsheet
- *MG Master program
- *VS Vector program
- *GC General graphics program
- *MA Macro application
- *LD Computer Aided Design
- *CK Data communication
- *DI Dialing
- *PE Programming environment

To set Program as the preferred word processing application add the following line again using a path as:

(Type =)

If you also want aliases specify the full paths under an [Applications] heading as follows:

CD ROM and disk are again together working together under the name OLGA.



Finally save the file as OLGA.INF

Start of memory?

It is possible to save the 386 memory profile of the OLGA manager by having it load and unload from memory automatically. To do this you'll need to add your system configuration file (MACRO INF GEM.CNF etc) to include an OLGA/ANALOG environmental variable. To do this under Hugs add the following line to MACRO.INF:

MACRO=MACRO

Others and other OS users should add the following line to GEM.CNF:

MACRO=MACRO

Make sure you edit the path to suit your system. The above paths are help shown as examples.

Size isn't everything!

So as software has a few kilobytes of memory I've shown you how you can extend the base memory of your OS to match the best Windows 3.11 and System 7 has to offer. Finally try not to forget too many users of these systems by allowing all your system's memory to be used for the most Windows and Macintosh software. However I know there will be dedicated Atari programmers busy learning the intricacies of to provide similar features for the Atari community - wherever (and whatever) is the next best form of memory obviously isn't it Atari's own? ©

SAMPLE OLGA.INF FILE

```

[Extensions]
BMP=VIEW
DTP=VIEW
ED=VIEW
DB=VIEW
SS=VIEW
MG=VIEW
VS=VIEW
GC=VIEW
MA=VIEW
LD=VIEW
CK=VIEW
DI=VIEW
PE=VIEW

[Type =]
WP=VIEW
DP=VIEW
ED=VIEW
DB=VIEW
SS=VIEW
MG=VIEW
VS=VIEW
GC=VIEW
MA=VIEW
LD=VIEW
CK=VIEW
DI=VIEW
PE=VIEW
    
```


66 *Journal of Management Inquiry* 18(1)

Play it again SAM...

Xiv takes a closer look at SAM and SACK...



If you've missed the "Step Forward" last issue (Smith-Peters Productions (SPP) has been given permission by Atari to distribute a ported version of their System Apple Module (SAM) to accompany KP SACK, an acronym for "KARL's Adventure Kit." KP SACK is a utility utility which makes it easier for programmers to store private sample locations in projects for use by SAM.

There are a couple of files you should read before using SAM. **README.DOC** contains a copy of the email we received from Atari along with the standard details for SPP. The second, **MAKING.DOC** is the manual supplied with Sack v1.1 but almost out of date, to still worth reading because the changes between that version and the published release are minimal and there isn't a space here to detail all of SAM's functions.



1. Add your own resource into SACK
2. and it creates labels for them which can be referenced in memory

To install SAM you require at least TOS 3.0 or a replacement such as MultiTOS or other A/C replacements. (PAGS, MIGHT) although not all the systems create major events currently under development. SAM consists of an Auto loader program, an accessory, and a CPU. The CPU reserves RAM and works out if the memory you want is loaded but you may need one or the other to get any output. The accessory is required to compare SAM but a you're short of memory it starts early because it should find needed code on the CPU.

On resources all assigned samples are loaded in memory. An address you have less of free memory (up to 128k) than three main memory starts in favour of a few

second out last. Memory use can also be increased by loading the same sample in multiple events because each sample is only loaded into the buffer once. On the other hand if you're trying to justify a memory upgrade SAM is as good as useless to say.

A couple of samples

KP SACK is an Apple II file written primarily for programmers who use the SAM. The documentation is in the KP-Sack manual as you'll need a working set up. KP-Sack v1.1 is on the 3.5" floppy disk. The program serves as a simple user guide and programmer's guide providing all the information needed to call SAM from your own code.

Using SACK, it is possible to create SAA (Sample Application) files which enable programs to store SAM in specific months. These months take two forms: global and resource. Globals are created with a "G" in "G" and so on, which are created in a large number of programs. By adding these with SACK, then loading the resulting SAA from SPP. The user can



assign samples to these events. Officially every program that uses globals should be supplied with an SAA file, even if it doesn't use any samples. This, however, is unnecessary so long as the user has at least one SAA with their file loaded in. For this reason we recommend you distribute the global file with your programs, because this has all the globals defined.

Memory is similar to globals, except they're application specific. Typically they're used when you want to give the user the choice to assign a sample to a specific event in your program, maybe a particular sound when the program starts or the "Music" during it called. To use memory you have to choose a four character code. Be careful to choose something unique or you could end up calling another program's sounds (as did I use "F0000").

With the cookie issue, it is possible to call samples from other applications, a SAA file. Generally this isn't recommended, but the book has included it to create the global file, which includes a number of "globals" in memory to address the issues we left with loading in the original set of globals. All these are defined in the public



it Old dog, new's old!

help, but include events, such as "Resource" and "Global" AP.

Of course SAM was a feature, although unless it is easy for programmers to use. For this reason you'll find a few header files (PAGS) following up the place. The **WORLD.H** file includes all the data necessary to call SAM's resources from Lattice C. Currently there are no plans to offer samples, but if you modify this file to suit your compiler please, please email us a copy so we can distribute it for the benefit of other users. The **GLOBAL.H** header simply contains global names for the new globals of the GLOBAL.SAA file.

There's a two-page header file you'll need to use. **AP_MAKING.H** is needed whenever you save an SAA, and is designed to make your life easier by following your use to find cookie names. Provided you keep each event in a different folder, you should be fine, but be aware if you save an SAA in a directory in which there is already an **AP_MAKING.H** file, the old one will be overwritten. This is probably only an issue if your programs require more than one SAA file, in which case keep them in separate folders, during development.

Finally, if you do write or modify your programs to use SAM, send us a copy in return, or include in the header file.

KP SACK V1.0 AND SAM V1.3

Supplier

Again from this, Reader think SAM and SACK are both available from

http://www.mega.com.au/~xiv/~sack/ and http://www.mega.com.au/~xiv/~sack/

And also PPG's website

Electronic

Programs

System

Atari/TT/Fellow and TOS 3.00 or later for SAM

* Application globals are as simple as entering code buttons

Willies adventures

Colin Polonowski gets an early look at one of the latest Falcon games under development by New Best Development...

Despite the excellent gaming features offered by the Falcon hardware, the number of games developed to take advantage of its capabilities is small. With the forthcoming release of Willie's Adventures

New Best

Development intends to improve this situation.

New Best Development is a group of four Swedes: Daniel Hellberg, Thomas Bergström, Anders Olsson, and Robert Foster - all with many years experience of Atari computers. Anyone who has played the

excellent *Baron* on the best generation consoles will be not only at home with Willie's Adventures, and meet all gameplay

this game offers quality. To date the only other game I think your worth mentioning is the same sequence in Double Double 2000, coded by the Riverside Club.

Surprisingly even the story is original although the idea behind the game itself isn't. Willie is a pointer who one day discovers his paintings coming to life. Eventually he gets trapped

inside his paintings and has to find his way out. Willie's Adventures are played out over four smooth scrolling worlds, each world consisting of at least two levels and worth out for events



happen in it. Each world features different enemies and its own distinctive graphical style. The overall aim being to find the exit on each level. Here's a rundown:

- **Jungle world:** darky forests of the jungle ready to be explored
- **Water world:** Willie swims around exploring the many secrets deep down in the ocean
- **Winter world:** cold and snowy - watch out for the penguins
- **Desert world:** Willie has to survive in his dealings with the crazy cowboys and Indians
- **Space world:** a related world where you can expect the unexpected

The graphics themselves are well crafted, colourful and the animation is second to none. Willie can be controlled using the keyboard or on Atari Powerpad plugged in as a port. As on the side of the Falcon. The Powerpad is



"If Willie were in a bit of trouble, there's a whole range of enemies lying out there"

"Willie's only defence is an axe - which he can throw"

undoubtedly the best option and the game makes good use of the standard functions available on the Powerpad. Basically the game is impressive with simple, sound graphics and a nice

background tune - which obviously didn't get on my nerves whilst playing!

This is a sprawling game which should give even experienced gamers something to think about. It's very addictive and contains the magical one more go temptation. I can't wait to see the full game which should be available before the end of summer. B

WILLIES ADVENTURES

Publisher:

New Best Development
Daniel Hellberg, Högskolegatan 85,
791 23 Jönköping, Sweden
Telephone: +46 340 60187

Dev(s):

Thomas Bergström, thoberg@phip.se
Anders Olsson, anders@phip.se
Robert Foster, rusk@phip.se
URL: <http://www.bas.se/~thoberg/>
Cost: Around £34.99

Requires:

Falcon, VGA, 486+ memory
extension



Crown of creation

Not content with being our German distributor, Thorsten Butschke reckons he still has time to save humanity...

In the year 2050 Panzerkraft and Fate are embroiled in a three-way war. You go thrust into the role of a Panzerkraft space-fighter pilot, then suddenly both sides begin talking peace. Instead of joining the job queue you join a secret project and discover the peace negotiations have nothing to do with any new fusion water standing or mutual tolerance and everything to do with first contact with an alien race called Sennari, and the last encounter didn't go well. The Sennari destroyed a Panzerkraft and an Alien space station without warning.

Both sides decide to pool their resources to try to save humanity from total annihilation and you're given state-of-the-art hardware (only developed by both sides) and sent off to discourage the Sennari in further adventures: a second alien mission appears and they fight against both the Sennari and humans.



During the mission you can monitor the status of each system component using this screen.

An important part of each mission is the selection and

maintenance of both weapons and components. Before taking you can load your LH 14 with a selection of weapons, components and tools. You can select between four different technologies: target-seeking missiles, biological weapons, energy components, precision strikes, defences, target computers, input devices, escape crafts, and so on.

Once strapped into your LH 14 battleship you're assigned tasks.

Linear start off simple enough, clear that minefield or destroy an enemy troop getting you just enough time to get used to the controls before the missions really get a toggle. You control that yourself up against several alien battleships or even native space stations.

If shoot me up is your favourite game genre you're probably wondering right now as to if a probably a good time to mention the "Fatal Flight" option eventually this is a shoot me up mode where you can train and destroy everything in sight. However you do still need to survive your human enemies attacking head on with all weapons blazing usually results in a total collapse.

COC really does push the Falcon to its limits, here's the techie details:

- Runs on TrueColor mode at 320x240 resolution
- All space ships and space stations are filled a shaded vector polygons
- The wire, optics and some sequences during missions have been scripted
- 24-bit surround sound stereo samples
- DSP used is provided to perform the 3D data and run up to 100,000 ops!



After scanning a lot why this which by all can also be loaded in context - very satisfying!



battleships and you can (if you so like) multitasking in school!

► **Verdict:** **strongly recommended** ◻

CROWN OF CREATION

Developer:
Richtofen

UK distribution:
16/32 system
Telephone: 08 000 34 50000
Email: 1632@panzerkraft.co.uk
Cost: £29.99

System:
Runs on 16/32/64, excellent on recommended

Plus:
Pushes Falcon to its limits. Totally absorbing due to the excellent animation and plot line, increasing difficulty. Variety of loading and take-off sequences. Plenty of straightforward tactical elements.

Minus:
On screen text is too dark. Screen on screen text (although squashed and poorly matched, as mentioned on disk). No continuation after failing a mission unless you installed an escape cell.

ratings:
Graphics: 70%
Sound: 80%
Control: 70%

87%

Gemulator 96

Fancy turning your PC into a real computer? Richard Kargmakers takes a look at the latest update of this Atari emulator...

Computer emulation seems to become ever more popular. With an army of people owning PC options, new emulators seem to be springing up everywhere. All the following products are capable of running Atari ST/STE software: Magic! (in Japan), FastBIT, STsim and TOS286, and there are doubtless others. I have no experience being most of these products but am led to believe Gemulator 96 is the leader at the pack.

Gemulator was originally released several years ago by Finnish Always Software (now called Emulations, Inc.) and is programmed by Derek "Quark ST" Mikkola. The latest release is a software Atari emulator which can be used with either TOS or Hags operating systems. TOS can be loaded from an image file on disk like HagsC or from real TOS ROMs plugged into an optional 68010 ISA hardware card.

With Gemulator 96 installed, you'll find yourself at the reigns of a formidable Atari system. Come with modest amounts of memory (8MB is the recommended minimum) you can emulate a 14MB ST/STE system to

both monochrome or colour modes. Installing VGA/AM PRO, an optional utility program, to the Auto folder it's possible to harness the resolution to the maximum post-PC system can handle. I usually work in monochrome at 680x400 resolution.

Just like a "real" Atari you can create an Auto folder on one of your PC hard drive partitions, add desktop accessories and customise your setup as desired. Additional hard disk

CD-ROM drives, modem or other device drivers are not needed; if windows can see the device Gemulator should do. There's something magical about running programs from an Atari CD on a PC. The 386's part II too limit also doesn't apply and floppy support even includes support for mass-formatted (but not hyper-formatted) DD and HD Atari disks - bear this in mind when porting stuff from your Atari to the PC.

Gemulator 96 version 4.0

Quark, Inc.

Gemulator 96

The ultimate Atari ST emulator for Windows
Created by Quark Emulations version 4.00
Copyright (C) 1991-1996. All rights reserved.
Distributed by emulations, Inc.
Email: emulations@emulations.com
Web page: <http://www.emulations.com/>

There's an enhanced version of Gemulator 96
Release date: Jan. 11 1997

Continue

(or use a full-modern table). Gemulator can be reconfigured to "work it off" emulation features you don't need and it has improved the overall emulation speed which has to be a good thing.

Compatibility

Probably the most important aspect of any emulator package is its compatibility - how many titles from the emulated computer actually work? With a PC not having any of the custom Atari graphics or sound chips or even the Motorola 68000 CPU all these tasks have to be handled by the emulation software - no extra load. Logically games with copy protection or specific timing requirements fail frequently and ST titles which don't work on the Falcon definitely won't work under Gemulator 96. Programs which hit the hardware directly are also likely to fail. In general you can assume any "legally" programmed GEM applications - files associated with Atari's programming guidelines in mind will work properly - including my own Ultimate Virus Killer (UVK) disk magazine. All News from Volume 7 issue 2 with the sound switched off in the SETUP file. Haines Terminal Utility (HTU) and Final Condition of Woylagger the Infinitely Prologued to use considerable smug efficiency too.

Gemulator 96 is also fast enough on a Pentium 60. In fact about the same speed as a standard ST except during floppy disk accesses when the mouse comes jerking it at all. Disk drives Gemulator 96 is the fastest Atari emulator on the market. It takes but at its word and never is to sacrifice with access to all the emulator features that interested?

With Gemulator 96 installed, you'll find yourself at the reigns of a formidable Atari system.

1. All 680x800 resolution there's plenty of room to place all your programs on the desktop. The Properties dialog sets all the emulation options.



FREE CLASSIC EMULATION!

If you've blown off your side on a PC system and have no money left over you can still indulge in Atari emulation using the earlier DOS-based version: **Emulator Classic v0.8** which is now available as freeware!



as reading and writing pre-defined sets in Windows disk mode also doesn't work which was disappointing. Maybe these programs are breaking the rules but they do work on most other official Atari systems.

Conclusion

For those who have lost faith in the real thing in a world where PC systems are forced onto people Emulator is a good solution. It won't turn your PC into a Falcon and unfortunately you can lose good bye to playing most of those classic games but as you English say "You can't have your cake and eat it" (although the etymology of this proverb has always eluded me). The main reason I eventually moved entirely over to Emulator for my Atari computing was to avoid switching back and forth between two systems - I didn't want to have two monitors sitting on my desk

Problems

There are a few distinct additions using Emulator (I really can't explain). The rest of a file (as downloaded by the GFA Basic IDE) (gfa) command is never found and the GFA Basic compiler refuses to compile programs unless you do some extra work. A file FILE.GFA can be selected but the compiler refuses for some inexplicable reason. Look for FILE.GFA.GFA. The solution I arrived at involved having two identical files called FILE and FILE.GFA. Which as far

EMULATOR FAQ

as is corroborated with Ralfien Goodwin, Richard Karmachars has recently set up a FAQ (Frequently Asked Questions) but for anyone using Emulator 96 or Emulator Classic, in addition to links and tips it also includes a list of compatible and incompatible files, which is getting bigger and more accurate continuously. Please write feedback at emulator@open.voxware.nl. Alternatively you can subscribe to the Emulator FAQ mailing list by requesting a "Subscription Page" by email to emulator@open.voxware.nl.

and performed to keep all my files in one location.

Now what's this I've been reading about a new emulator called Pac2ST which can allegedly run most ST games - I'm keeping my eyes peeled.

Gemulator 96

Joe Connor goes back to the future to review Emulator 96...

I've been a Gemulator user since the early DOS based version and having recently been lured away by Magic II I was interested to read its kind's review.

TOS image files can now be saved to disk and loaded by Emulator instead of reading the real thing from the ROM card

Emulator 96 does include a number of changes which make it a much nicer emulator than the early windows release I previously mentioned so here is a good time for a second look. The following changes grabbed my attention:

TOS image support

Using "ROM extraction software" TOS image files can now be saved to disk and loaded by Emulator instead of reading the real thing from the ROM card, which is now an optional purchase.

This means laptop PCs, with as little as 1MB RAM can now run Emulator. The Magic OS is also reported offering true perspective multitasking in mono and four colour

emulation. Access does not appear to be supported.

Winkler

This firmware utility programmed by Martin Lindström is a replacement for VGAMM.FRG. It is an emulator utility which supports higher than standard ST mono and colour resolutions. However VGAMM.FRG displays actual resolutions using ST low AES screen gadgets with tail

lines, every time refresh rates are modified and always displays the correct kates with or without NTSC.

Under TOS Winkler works fine.

Emulator 96 First Time Setup

For Emulator to work at best resolution (1) select system configuration (2) choose the display resolution you want to select (3) select the resolution you want to use.

Then you get a display PC system in your Emulator 96 window, under the "System" menu (4) select "New Settings" to configure the system.

1) Select System

2) Select

Then you get a display PC system in your Emulator 96 window, under the "System" menu (4) select "New Settings" to configure the system.

3) Select System

4) Select

Then you get a display PC system in your Emulator 96 window, under the "System" menu (4) select "New Settings" to configure the system.

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Then you get a display PC system in your Emulator 96 window, under the "System" menu (4) select "New Settings" to configure the system.

WINKLER v1.00
by Martin Lindström 21 May 1996
Building on Derek Hitchcock's VGAMM idea

Use arrow keys to adjust the size of the Emulator window (50 screen):

800 x 600

Then select it with Return

Or select among following preset sizes:

- | | |
|----------------|----------------|
| 0: Normal size | 4: 1152 x 864 |
| 1: 640 x 480 | 5: 1280 x 768 |
| 2: 800 x 600 | 6: 1280 x 1024 |
| 3: 1024 x 768 | 7: 1600 x 1200 |

fully. You can't do it, but it works properly with Magic 3 and I had to delete my copy of Windows 95 from the CD!

DirectX mode

If you want to pretend you're running a real Atari machine run Gemulator in DirectX mode (a combination of Windows 95 and Windows NT) and it will run completely like the Atari. Using the (Alternate)-(F10) keyboard combination toggles between windowed and full screen mode offering the best of both worlds.

Video modes

Running TOS Gemulator supports the three standard ST resolutions plus some extended low and video colour resolutions up to the capability of your monitor (800x600 is robust, not a good working resolution on my system). Under Magic 3 the three standard ST resolutions plus 800x600x15, 640x480x4 and any non-extended resolution up to the capability of your monitor are supported.

Extended 16 and 256 colour modes are not possible although there are patches for Gemulator IV which should also support Atari TT and Apple Macintosh resolution.

Other stuff

Previous Gemulator versions did not support the (Alternate)-(F10) keyboard (or that of rotating special

characters) but Supply have now implemented them's a lot of a non-functional but useful key to always close - but at least this can now be reversed (sort of the best) by pressing (Alternate)-(F10) on a US keyboard.

Conclusion

If you don't need long filename support or 256 (or higher) colour resolutions and you intend to run single TOS apps of the time Gemulator 96 is a mature product which is attractively priced at about half the price of Magic PC.

If you intend to run Magic 3 most of the time Magic PC is the best option - Magic 3 support in Gemulator is better on and it shows. ☺



GEMULATOR 96

Publisher
Emulat
Email: emulator@emulat.com
URL: <http://www.emulator.com>

UK distribution

Paul's Choice PC Box 100
Northampton NN2 7BN
Tel: +44 (0)1603 545 020
Fax: +44 (0)115 914 0345
Email: info@paulschoice.co.uk
URL: <http://www.paulschoice.co.uk>
Cost: Gemulator 96 software
£49.95 Gemulator 96 ROM
reader card and TOS 2.06
ROMs: £149.95, prices
include P&P

Requirements
TOS 1.04 or 2.06 on ROM reader
card or TOS image file
Alternatively Magic 3 versions 2.4
and 3.0 running on a 386 or
486 processor with Windows 95
or Windows NT

Pros
Excellent TOS emulation
Under Windows 95 (or better
architectures) - 32-bit colour support
Competitively priced

Cons
No support for 256 colour (or
greater) resolutions under TOS
Windows 95 file system not
supported - No support for 16
colour (or greater) resolutions

88%

BENCHMARKS



Test system: Pentium Intel 133MHz 16Mb memory PCI video card
Left: Gemulator running Magic 3 **Right:** Gemulator running TOS 2.06 Both
tests performed on same system with best HWID Compared with Magic PC
Gemulator results in ACPI 285 Gemulator runs in faster results.

SCOOTER is the first of its kind



Derryck Croker reviews Scooter, a PCB layout program...

Printed Circuit Board (PCB) layout programs are undeniably a niche product. Over the years the Atari platform has been better served than most with programs such as PC Board Designer and Plotter translated and released in English. Scooter is the latest to cross the language barrier, adding professional level features at a budgeted price tag. Scooter is equally at home producing complex PCBs as simple designs. Like the Lantana board covered in the step by step tutorial.

Scooter runs at 640 resolution above 400x400 pixels (ST high) and where layers, colours or more are available they can used. Scooter includes intelligent "auto-routing" a feature normally only available in packages aimed at the professional market. Automating can automatically transform a highly-jiggled mass of components and their connections into a neatly laid out PCB ready for production.

The combination of a file menu, drop down menus and pop-up menus provide a comprehensive range of options. The menus are well organised so you're not confronted by choices until they're needed. For example, after writing the track thickness is

either predefined then filled with a selection of hatching options.

Boards with up to 20 layers can be produced and each layer can be individually named, filled, hidden and printed out. Scooter's ability to produce an outline for use with Numerical Control (NC) milling machines should more than satisfy professional users.

Leading library

Component outlines and the numbering of components are set when saving and loading a board. All components must adhere to a numbering system so the correct connections can be made. Using a numbering system makes it possible to link a component which only works properly one way round (quadrant sensitive) in the real life, others are not multiple.

Scooter includes a comprehensive selection of components but for the odd occasion something you need isn't included the layout screen can be used to create or modify an existing component.

Scooter really does ease the process of printed circuit board design and is a pleasure to use. Even for one-off designs it's probably quicker to use Scooter than a lightboard and for small batch productions it's an ideal choice. A saved/loaded data version is not available from most PC manufacturers. Get it at any Atari supporting 8086 connected to the Facilities network as SCOOTER.ZIP.

right corner of the screen a pop-up menu offering further options to set the shape or radius of track corners and so on. Solid areas typically used as "ground planes" can be drawn

File	Edit	View	Tools	Options	Layers	Foot	Help
Open...	Copy	Zoom In	Place Component	Set Layer	Set Layer	Set Layer	Help
Save	Paste	Zoom Out	Place Trace	Set Width	Set Width	Set Width	Help
Save As...	Undo	Fit	Place Pad	Set Drill	Set Drill	Set Drill	Help
Print	Redo	Full Screen	Place Via	Set Annular	Set Annular	Set Annular	Help
Quit	Find	Exit	Place Hole	Set Plating	Set Plating	Set Plating	Help
	Find Next		Place Slot	Set Thickness	Set Thickness	Set Thickness	Help
	Find Previous		Place Pad	Set Spacing	Set Spacing	Set Spacing	Help
	Find All		Place Pad	Set Drill	Set Drill	Set Drill	Help
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	Find All		Place Pad	Set Spacing	Set Spacing	Set Spacing	Help
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[illegible]

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WORKS then asks for the name of the icon. The first dialog box we are going to create is an information box, **INFO**.



Select **Edit**. An empty box in a window appears on screen. This determines the size of the dialog box. Click and hold the mouse down, on the bottom right hand corner to adjust the dialog to any desired size bearing in mind we'll need plenty of space to add copyright messages and general information. To add text go to the **Strings** menu and select **String**. The mouse pointer changes to indicate the selected options. Move the pointer into the empty dialog window and left click to place the **STRING** and the mouse pointer returns to its original shape. Now double-click on **STRING** to edit the text.

Type in something like the PDB tutorial by Paul Jones for Atari Computers. The PDB tutorial by Paul Jones for Atari. Copying the name is required so select **OK** and the text **STRING** displays your text. Create another string. This time edit the text to: copyright Copyright Paul Jones 2005. Again the mouse is required. The string can be moved around using a Drag/Drop action so position the string centrally in the dialog - being careful to size the dialog so it can be displayed in 576x1024 resolution (1640x864 pixels).

Create another string. Version 'V' followed by a **TACT** object. Position the text to the right of the 'Version' 'V' string and double-click on it. The text field should read 0.00 with the mouse 'on'. Click once on this object and, back to **STR** menu select **Open up box** and edit its value. Add another string

FIRST CONTACT

If you want to contact Paul for comments or advice, you can email him at paul.jones@atari.com or at He also has a website at <http://www.atari.com/programmers.htm>

SHAREWARE - PLEASE SEE INDEX FOR DETAILS. Now select **Buttons** to create a button and edit the text to **OK** and the name to **OBJECT**. Go to the **Flags**



Move the objects around until your dialog looks something like this



It doesn't matter if it's not exactly the same as long as the version number and button are present so feel free to experiment.

Finally click anywhere on the dialog box and select **O** for the colour in the **Fill** menu and **Background** in the **Flags** menu. You've just created your first dialog box!

The names in the dialog are used to address the object through **HIDIALOG**. Texts can display whatever we want via a dialog element. This is useful for text like the version number and we can write a routine in **PDB** to change the **OK** to anything we like. I do for example. If we still do this, and add a text string we would have to manually edit the resource file to change the version number. Finally select the window closer gadget to close the dialog box - note the dialog

box we just created has been allocated as **Icon**.

Menu making

To create a menu for the program select **Menu** from the **Tree** menu. Set the name to **Menu** and select edit. You should see something like this on the screen:



Double-click on 'Your message here' and edit the text to: About PDB... be careful to keep two space characters at the start of the string and name the string **ABOUT**. Now select **Title** from the **Object** menu. Move the mouse pointer over to the **File** title and press the left button. Click once on the **File** menu. Select string from the **Object** menu and click just above the **Quit** item as our new item. Repeat this three more times. Double-click on the first string and edit it to 'View File' with the same **VIEW**. Similarly edit the second string to **Font** title with the same **VIEW** and finally edit the third string to **Options** (as none of default) with no name. Click once on this string and select **Disabled** in the **Flags** menu. Double-click on the **Quit** string provided and edit the name to **QUIT**.

Click once on **TITLE** the new title we just created and change the name to **Options**. This time we need five strings, add these as before and edit them as follows:

- Text: Printer options, name **OPTS**
- Text: **RESETTEXT**, name **REC**
- Text: ———— no name, flag set to **Disabled**
- Text: Load settings, name **LOADS**
- Text: Save settings, name **SAVES**



Now save the **PDB** file in the same directory as your **BASIC** file using the **Save** option in the **WINDOW** File menu.

That's it for another lesson. Next time I'll explain how to use the resource file we've created from the program. Until then, experiment until you're familiar with your resource editor and the **BASIC** editor and if we run into problems please do write to me! Q

HTML coding

Neil Jones-Rodway takes a look at "clickie-pieces"...

If you've had a chance to play with images since last time you may well have used images to produce a menu to take the reader to various links. Instead of using individual images for each menu item, they can be combined into a single image. This offers a couple of advantages when used on-line:

- The filesize of a single image will be smaller than a series of individual images
- You can fix the relative positioning of the images will remote editing as you introduced images are what we used. They came about fairly early on in HTML, a development that provided a method of making selected areas within an image "clickable", ideal to creating menus from a single image.



1. Here is an example image designed to be used as a vertical menu

Originally the client stuff was handled by the web servers, the browser would send the server a pair of coordinates (indicating where on the image the mouse was clicked) which the server then checks against a map file and informs the browser which file it should be getting.

Although images are handled by web servers worked well, it wasn't an elegant solution suffering serious shortcomings:

- Because a server was needed, images could only be used on-line
 - Different servers implemented the map file in different ways!
 - Browsers had no way of knowing which bits of an image were clickable, so map files had to contain a default link which would use if a non-defined area was clicked on
- Eventually a possible alternative called "Client Side Images" was

emerged. Client Side Images held a description of the clickable parts of an image in the HTML file itself which means they can be used both on-line and off-line and browsers can interpret the clickable areas of the image locally.

Since most modern browsers (IAR included) support Client Side Images let's assign web server images to the domain of history and explain how to handle Client Side Images:



1. Here you can see the "hot areas" superimposed over the menu image

The image map itself is a collection of areas linked to a URL - the areas can be described using circles, polygons, or more commonly rectangles (some servers a good time to point out CSS 1.2 only supports rectangles whereas CSS 2 supports all three).

A rectangle is defined by specifying the coordinates of the top-left and bottom-right corners of the clickable area or "hotspot". To make the job easy use an `alt` property which can display the corner co-ordinates. Circles are specified by specifying the coordinates of the circle's center point and its radius (in pixels). Polygons are specified using a list of co-ordinates - one pair per vertex.

So how does this look in HTML? Well, somewhere in the HTML source you need to describe the image map:

```




```

The syntax of each individual line varies according to the shape it follows:



2. The image map shows, in action on a page. Compare with alternative test table

```




```

So taking our example menu image and having pointed down the coordinates of the "hot areas" it's easy to setup the images map:

```




```

To use the images map we need to add another parameter (`USEMAP="#.MapName."`) to the image tag as follows:

```



```

Images have not lost internet flow because they use images they've not much use for text-based browsing! For this reason it's good practice to provide alternative text based links (maybe even several) map have spotted those and to image maps or in the bottom of each web page.

What a fix for this issue - have fun building up your image or image maps!



Reading, writing and arithmetic

In this issue Xav takes a look at the code needed to read a joystick...

It's fairly recent, last time we looked at how the joystick manages to make lots of switches into only a few connections using a system called multiplexing. This is achieved by taking one of four input lines low and sending the corresponding switch information to the output via some Schmidt triggered buffers.

Therefore in order to read the overall status of a joystick, our software routine has to take each of the input lines low in turn and read the output at each stage. Input lines on the joystick correspond to output functions the computer will store. This means our code has to write a value to the computer's output lines, then read a value from its input lines before moving on to write another value to the output lines. To read the overall status of a joystick, these steps have to be repeated four times, but it gets worse!

Under supervision

It is also worth we would simply use a call and ask the operating system, "Is Could you fill this area of memory with the joystick status please?" However there are no operating system calls to deal with the joystick, so we have to implement them ourselves.

If you're thinking it can't get any worse it can—the I/O addresses for a hardware address which can't only be accessed from a C program!

The way around this obstacle is to let the microprocessor take believing we're actually part of the operating system, which is easier than it sounds! The 68k series of processors at the heart of STs and Falcon, besides provide a concept of "user" and "supervisor" modes—the idea being the OS works in supervisor mode, running applications in the

more restrictive user mode. This is designed to prevent programs doing anything nasty without the processor realising what's happening.

In order to directly access the I/O memory addresses we need to switch the CPU into supervisor mode, which is done using one of two OS hand calls provided. The first, `Supervise()`, is an 80386 call which is used to associate a whole function in supervisor mode. The second, `Isupen()`, is used to switch into and out of supervisor mode within a function. Since applications should remain in user mode we'll use the `Isupen()` call just when we need it.

To enter supervisor mode call `Supervise()` with a NULL parameter and the function will return a pointer to the old supervisor stack pointer, which we store to use as a parameter later on.

Don't worry if you're not sure how to handle pointers and stack pointers; the code on the Reader disk handles everything for you. It's still worth knowing the life to familiarise yourself with how to use `Supervise()`. On completing our task in supervisor mode we need `Isupen()` passing the pointer we saved earlier as a parameter, which enables the processor to jump on where it left off.

Bits and pieces

Now we know how to switch into supervisor mode, the rest is relatively straightforward. The address of the I/O port lies in 0x7F302 so we can write a mask to this address with one of the bits set to zero, polling the corresponding multiplexer line low. These masks are defined in the file "mask.h" on the Reader disk.

Once the mask has been written, we can read the input lines to see which switches in the selected group are being pressed. This information is split across two addresses with

0x7F302 containing the first buttons option (game details while the upper bits of 0x7F302 contain details of the joystick's keypad).

Here's an example, if we write a mask of 0x7F7F to test group 1, then bit 0 of 0x7F302 corresponds to fire-button A on the joystick in port A and bit 1 is the PAL56 button for port A, bit 2 is the function A for port B and bit 3 is the PAL56 button for port B. Similarly if we read 0x7F303 we will find bit 0 corresponds to UP on port A, bit 9 is DOWN on A, bit 10 is LEFT and bit 11 is RIGHT. Bits 12 to 15 represent the same data for port B. However, because the mask only activates the multiplexer line for port A, the bits for port B will still be 1023—remember bits are taken LOW if buttons are being pressed.

This information is summarised in the table and also defined in "joyp.h" on the Reader disk. By way of an example, this file also contains a function to read all the buttons on a joystick in port A and fill in a structure defined in "joyp_data.h" accordingly. Using a function like this is quite straightforward, simply pass it the address of a suitable structure then make use of the data. As a first step you might like to try printing out the joystick status, and the file "joyp.c" on the Reader disk is a simple program which does exactly that.

In the next coding instalment...

By far the best way to get a feel for the joystick code is to play around with it so I'll leave you to adapt and modify the code. Next time we'll look at a few tricks which speed up reading the joystick and take look at the 30 button Procontroller. ☺



	PF0002				PF0003							
	Bit 0 (Port B)	Bit 1 (Port B)	Bit 2 (Port A)	Bit 3 (Port A)	Bit 15 (Port B)	Bit 14 (Port B)	Bit 13 (Port B)	Bit 12 (Port B)	Bit 11 (Port A)	Bit 10 (Port A)	Bit 9 (Port A)	Bit 8 (Port A)
Group 1	Fire A	Fire B	Fire A	Fire B	Right	Left	Down	Up	Right	Left	Down	Up
Group 2	Fire B	N/A	Fire B	N/A	1	4	7	*	1	4	7	*
Group 3	Fire C	N/A	Fire C	N/A	0	0	0	0	0	0	0	0
Group 4	Option	N/A	Option	N/A	0	0	0	0	0	0	0	0

* The illegal information returned on joystick

Disk copying

So you thought disk copying was straightforward? Mark Baines looks a little deeper...

Programs don't crash while writing to the disk for lots of reasons - maybe you pressed the wrong key selected the wrong source disk put the master disk in the drive took the disk out of the drive with the motor was still running, split one of it or maybe the baby found a new thing to chew.

What a disk doesn't work any more or the program file is corrupted and you've had a good cry what can you do about it?

Backups

You can of course revert to your backup or master disk can't you? Yes! Well doesn't it? Well, I thought so, the importance of backing up every disk whether commercial or PD can't be emphasised enough. Most if not all, commercial software distributors allow this (provided you legal basis for possessing it) is questionable) and one should always work from a copy of the master disk and not from the master disk itself (I assume some disks cannot be

copied so easily because of some "protected" techniques employed by the publisher to prevent copies being made for illegal distribution. It is usually only games which regularly fall into this category because most of us are spoiled from booting hard disks so the disk contents have to be rather carefully installed on copied anyway.

There are two ways to copy a disk the easiest being to use the Desktop's built-in Copy Disk function.

Disk Copy

This is achieved by dragging the disk from A to disk icon B or using the appropriate item in the menu. Under TOS 1.04 Diskcopy is in the Format dialog box (usually, Spire won't be worried here describing how to do this though to say that the master or source disk should always be write protected by opening the little hole in the bottom left corner. If there is only one floppy drive and TOS asks for repeated changes of disk this will prevent the wrong disk being written to. It is as easy to get muddled and

have the wrong disk in the drive. Also one should not be too eager to take the disk out. Wait for the drive light to go out first. Taking a disk out when it is being accessed by the drive will damage the disk surface and possibly the drive's heads.

However, many people do have problems with using this technique on some disks and understandably

wonder why TOS is so awkward. GEMDOS demands that the format type of both disks be the same. They should both be single or

double-sided and formatted to the same standard and size. GEMDOS has only ever allowed disks to be formatted from the Desktop with 80 tracks and size 400mm. When GEMDOS copies a disk it is reading each sector into memory and then these copies them one at a time onto the destination disk. If that destination disk has 80 tracks and 18 sectors (a common format) then there are more sectors per track than GEMDOS has data for and the source disk boot sector's map of the disk structure doesn't match the destination disk's structure. The error alert "The destination disk is not the same type as the source disk. Please insert another disk" then appears. If it is known that the destination disk has an irregular format then the solution may be easy. About format the disk from the Desktop and start again.

But many source disks are not formatted to the Desktop norm. Increasingly, distributors of software use greater capacity formats to get their large programs and data files

1 FirstCopy kills most disk copying needs and includes an extensive formatter where focused formatting configurations can be saved as presets.

onto them. Some use very unusual formats in an attempt to prevent them being copied. Unluckily, it is easy to format a destination disk to the normal standard only to find they are rejected again. It would have been a simple matter for the TOS programmers to allow the destination disk to be formatted during the copying procedure using the details contained in the source disk's boot sector. Very little extra code would be needed and the result would be a tremendous improvement of versatility. But TOS isn't like that and so third party programs soon came to the rescue.

A decent disk copier and formatter program is essential the following have a good track record:

- 1st Copy 2 by Martin Reinhardt (PD)
- H-Copy by Robert Weiss (shareware)
- FastCopy PRO (commercial \$195 from Fast Copy)
- E-Copy (commercial from Systems Solutions)

There are dozens of other PD disk copiers available but most aren't intelligent enough after others' inspection.

FastCopy and H-Copy appear very similar and at first sight seem the complicated of with lots of buttons and boxes which can put new users off. For the simple purposes of making disk copies it is no harder than using the GEM Desktop with the added bonus they're intelligent. Destination disks do not need to be formatted beforehand as FastCopy tracks the



User Group NEWS

April WAG Meeting Report

The virtual words from the 11th Wessex WAG Wintertime Ray festing on meeting us all under this meeting were "Bliss" they're all cranked out of the woodwork today haven't they?"

Whilst there were a fair amount of people at the last couple of meetings the last meeting showed signs to have attracted a higher than average turnout.

Most of the usual crowd attended including Colin Palmer-Watkins, in Garsdon, Chris Elroy, Chris Ballalad, Norman Black, George, Mick Lock, John Heywood and some one members whose names I haven't all remembered yet.

A general talk followed during which Mick Lock took charge and notes were taken regarding the possible purchase of an SBC system by the user group using our subscriptions and the ability of the committee to spend up to £50 of WAG money without having to get permission from the group via a vote. This, in theory at least, should enable WAG to take advantage of any special hardware/software offers which might arise. The new members were also introduced and looked after by some of the other members.



After the general talk, everyone went about their own business at the meet. Mick Lock was showing off the latest Puckett using a Watson graphics tablet, etc and Chris Holland was showing off some new demos. It

Gardner was trying to get my Zip drive to work as I'd forgotten to bring along my boot disk.

All in all, a most enjoyable and successful meeting. It was nice to see some new people there, but I hope they attended the next meet, along with YOU!

Email: info@wagmet.co.uk
<http://www.wagmet.co.uk/wagmet/>
 Acorn! Support
 WAG Secretary

The SWAG Report

By 1.40pm were wondering SWAG stands for SWarage & Bartondolter Acorn Group!

It's a new group covering an area that was previously divided of exclusive Acorn support. Our first meeting was held on the 5th of April at Berewell Community centre, Swarage.

After putting up numerous flyers, utilising the help of the local papers and telling people via the BBN network, we ended with a mixture of anticipation and scepticism for more to turn up and we were pleasantly surprised 23 fellow Acorners attended with ages ranging from under ten to over 70. We took along Sile and STFM machines and a bag (which ran down all evening) and were pleased others had also brought along their machines. Paul arrived with his Falcon, another member arrived with his Sile and one member turned up with a laptop PC! Before the lunch talk got him he managed to get his Atari 26-resulator up and running some classic Acorn games.

"Capt James T" designed to shed on a modern day Delboy. In the treated (just happened) set up his market stall to the corner and started selling everything you could think of software, hardware solutions and he went home that night richer than financially but, Acorners, another enthusiasm have the deal.

As it was the first meeting we tried to make it as informal as possible with everyone

mingling and using the computers. It was a great success. The talk and online logs flowing and before anyone realised it was 11.15 o'clock and we were forced to end the evening far too quickly.

By the end of the evening we'd solved many problems and even created a few as people realised Acorn machines could do much more than play games. Thanks to Nadine there should be at least two new BBN users with hopefully more to follow.

Meetings will be held every second Wednesday at Berewell Community Centre, Berewell, Swarage (Swarage) so if you're in the area do pop in and say hello.

Jeremy Beadell

MACE down under



McBoswell (MACE) Computer Enthusiasts (MACE) is Australia's oldest Acorn user group. MACE meets once a month, puts out a monthly magazine (mostly January), a Disk of the Month (DOM) (expresses a full time bulletin board using the wonderful Rabbit Software and we have our own web page.

Our monthly magazine (The Mag) is a peer based magazine and we intend to continue its production for the foreseeable future. However our main concern is getting members to write articles. They all say they can't but we all know they can don't we?

The DOM is a relative newcomer at only two years old! It was our aim to keep that running whilst finding new software to include on it, at least we have access to the Internet!

If you have any articles to contribute or programs we can include on our DOM please do get in touch and if you find yourself in Melbourne, Australia do drop in and say 'Hi'!

Email: barty@phishnet.com.au
 OR: <http://www.mca.com.au/mca/>
 -Julian@mcsmc.com.au

Colleen Marland MACE secretary

UKAUG Changes

Please note with genuine effect the new address of the UKAUG is UKAUG 37 Garsdon Road, Yardley, Birmingham, B26 1AN, England.

Mary Schmitt



Martin Milner takes a look at the facilities offered by Les Greenhough's CONTROL extension (v3.6 registered)...

Also amongst the CONTROL extension is a number of commands which can be used to improve the structure of your programs. (For example raise and set) is a command to write strings of text anywhere in memory (write) is a command to add one variable to another, but keep it within a specified range (add2 of 10) commands to move and restore the cursor position (move, cursorset and reset) and the usual one I which can be used to check whether files exist.

Also contained are a number of commands to drive graphics plugged into the parallel port via a special adapter, some commands which allow up to 320x200 pixels to be defined, a

command to output Clark Art screens, a palette manipulation command (pset), a command to remove the screen borders as an STGM (level remove) a quick screen command (quick) faster than its STGM equivalent) and the command format which performs smooth horizontal scrolling on a standard 320x200 sized screen.

Doing deeper reveals a wealth of very powerful commands. For example:

- The extension contains a complete sprite engine which is much faster than the original STGM one and has the ability to flip sprites vertically. This means you might not need both upward and downward facing sprites. Clipping and collision detection commands are provided as are commands to get sprite sizes and palettes.
- A complete set of mapping commands are provided which are not restricted to using Atari's built-in levels under the Missing Link commands. An accessory is provided which enables you to design your own maps. It is even easier to use than the Missing Link map editor and uses the concept of layers.

A supplied accessory enables banks of sprites, blocks or levels to be created very easily. The biggest advantage of all the sprites and map commands is they can work on non-standard screen sizes, so you are no longer restricted to 320x200 (32 low resolution). The extension also contains commands to set large virtual screen sizes and to use the bit or along with hardware scrolling in all directions on suitably equipped machines. You can also use the latter to copy large sections of memory around (copy) or clear it using bclear. A command is also provided to write to colour fonts from image banks into a large size screen.

A number of the commands are only available to registered users including:

- Jpeg command enables your programs to support the jpeg image controller.
- Moviecopy is an ultra fast 320x200 screen copier.
- Many other advanced mapping and sprite commands.

Considering the amount of work involved and the support provided to registered users, registration is a must.

Next time I'll be taking a look at the latest version of Anthony Hodges excellent Palace extensions. ☐



Mike Keraleke kicks off a new series designed to stir programmers into action...

Software may be programs, desktop accessories or CPUs, whatever is most suitable for the job.

The first idea is for an all-round email address database. Most of us have sent lots of emails and for people we keep in regular contact with we usually have a recent email posting handy which can be used as a reply to. I compile. However, when browsing through Usenet postings, websites, printed magazines and so on there is no easy way to keep track of them and most collectors I know end up with loads of unsolicited Post-it notes and the resulting desktop chaos.

It would be nice to have an address book which can be used to jot down email addresses, along with a name and a few extra details and then be able to manipulate these details into lists. For example, alphabetical by name or by Internet Service Provider (ISP) or even, by type of address. I can't go as far as saying that. Naturally options to output the lists onto paper for easy reference and to send them

electronically to the correct fields in applications would be desirable.

Email addresses are built up in stages and sometimes in complex and even redundant ways like: # mail (max) separation symbols could be developed to sort them into lists in any desired format. Here's the general idea.

Mike Keraleke: publist@compuserve.co.uk
Star Computing: starcomp@bt.com
The Group: 0800 226400/compuserve.co.uk
By Group: group@bt.com

By ISP number

starcomp@bt.com
0800 226400/compuserve.co.uk
publist@compuserve.co.uk
group@bt.com

By real name number

Star Computing: starcomp@bt.com
Mike Keraleke: publist@compuserve.co.uk
The Group: group@bt.com
The Group: 0800 226400/compuserve.co.uk

Keep programmers, that's the idea now take it away, send us the postcard and we'll take a look.

If you have an idea for a program and can't understand why it hasn't been developed already please send it to us as a ASCII file on disk preferably and we'll either be able to point you towards an existing program or maybe print it here... ☐

GRAPH 1.49

90%

Utility/Business

Shareware, 1Mb memory, all resolutions 640x400 (ST high) and above, SpeedoGDCS/NVDI 3 or higher

Ever judged a book by its cover? We all know we shouldn't and it was in this spirit I started to review Graph. I was expecting a simple graph plotting utility and instead I got a modern GEM interface offering an amazing range of options to display data as graphs.

Graph, programmed by Bernard Le Thaut in France, includes basic text handling features but really comes into its own when used to do the job it was designed for—displaying graphs!

Data can be imported or entered directly then manipulated in a similar manner to a spreadsheet, aided by a comprehensive selection of standard mathematical functions in the calculator.

Graphs can be displayed in various styles including line, scatter, pie chart, histograms and so on. Each includes its own, presumably useful, line tooling. For example a line graph can be set to use "spline-interpolation" which generates a smooth curve from just a few data points.

At least one concerning the presented two seems to be on hold—there's a greyed-out option for 3D pie



0 Deeply a browser to use—over the time, worth look great!

charts (at least the overall style of graphs) and the amount of control allowed over these suggests Graph is aimed at scientific use.

As a stand-alone program, Graph performs admirably but used in conjunction with other programs such as Payava it really comes into its own.

Graph requires GDCS and is supported with either SpeedoGDCS 3 or

NVDI 3 or later which provide access to vector fonts.

Editing individual page elements is achieved by invoking external

programs. For example I set up Knolly as my preferred GEM window editor. If the author added support for the GEM,

perhaps Graph could automatically communicate with other applications further enhancing its usefulness.

Two versions of Graph are supplied, one for standard STs, the other for machines with a 68030 processor (or later) and a 68030 maths

co-processor. Operation is generally fast—even on an ST—with enhanced features MATHS/NVDI users.

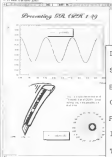
Unfortunately some minor window redraw bugs have appeared since the author fixed some earlier problems but these do not seem to impact performance. I'd also like to see keyboard shortcuts added, especially the keyboard shortcut for cycling windows (Control-W).

Graph at the moment will load restrictions—which is unusual these days—so if you like yourself using Graph regularly repay the author's trust and send the £20 registration fee to:

Bernard Le Thaut, 37 Av. Rene Lemaire, F-93800 GROSBOIS, France

(Shouting La)

0 A few minute job



Linear

Statistical

Bar

Casechart

Polar

Image .GEM

Text



0 A lot of French points in the layout selection menu

DEUCE

68%

Game
Shareware, any STorSTFM



unfolding splendored
voice which commands
us how good or bad the
last move was. While
moving it on the better
Mega STs machines this
visual display made
with the Regimian
costs between 10 and 20
dollars

Shirley Lai



Duce, released by Outermelt in Australia, is a classic single-screeny game. A grid of tiles goes up various rows, and the player has to match up identical pairs by connecting two tiles at a time. In one player mode it's played against the computer; in this case a board with a long list. Alternatively two players can battle it out by taking control and scoring points for each correct match. The grid size is the only other option allowing it 24 or a ridiculous 50 points which also the board are too small for standard.

The game is peppered with a setting consistency in the form of a



SENIOR DADS AIR DIRT 75%

Entertainment
Freeware, Falcon only



This rather amusing freeware introduction to the world of the Senior Dads into the world of multi-part discs. At first sight it looks like a parody of classic efforts: cartoonish music and outdated graphics. However, the humor behind the drive-room songs, though, and by the end you're laughing along with it - well I won't suspect that drive is best enjoyed in company of more like-minded friends. The highlight for me was the end point each reveal right at the end with nostalgia and music which put it to shame anything else that



describes itself as multi-media! Air dirt isn't going to win many friends among those who consider drive watching a waste of time but some fans should get the joke and appreciate their efforts. Probably one of the best designed and produced releases of the last year!

Chris Reddick



PLAYSID V2.0

90%

MDA/Music

Freeware, separate Falcon and STe versions

Criem has been busy updating Cria and Commodore 64 music player and since it was last reviewed it has gone through several revisions. The most obvious addition is a custom file selector while internally the replay routines have been improved to allow crisp (80) to output on standard 8000 Hz machines more accurate emulation of the 80-chip and, for Falcon owners ever have, DSP surround effects. Temp is now also implemented and a new STe hardware problem which causes crashing in the sound has also been worked around.

There is now a feature which requires a little explanation. PlaySID's internal consist of two main

parts, the 80-music file reader and the actual sound chip emulator. Since this is a C64 music player it makes sense to consider the C64 a soundchip too, as the actual synthesis is performed entirely in the digital domain. It can theoretically emulate any sound - and that's what the authors have done! PlaySID can now also play C64 music files using an emulation of what for it. The ST's own Yamaha YMG149

With each release PlaySID gets even closer to the real thing, but perfect emulation will require using the Falcon's super fast DSP to emulate the 80-chip's effects, high quality real time



digital filtering takes huge amounts of processing power. Apart from that some video style transport controls for track access (80 music files typically contain a table of memory and macro/micro would be nice). I tell a lie, can't be implemented in the up arrow key - it's the "Midi" feature mentioned in the manual.

Shirley Lai



1ST MATHS

Education

Shareware, any STE/STFM



are the best! The first three are based on numbers - counting, odds, evens, addition and subtraction.

The fourth and final game is a memory browser and instead of a selection it's

actually a cut-down version of Drac (you review in this issue) and it takes 1 year to make a selection!

The bold, colorful icons and pointer to select the answers from the numbers displayed arrives at the bottom of the screen as all designed with young children in mind.

Should young children really be learning dangerous math?

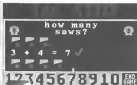
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There is only one opportunity to enter an answer and no time limit, which should encourage careful thinking and accuracy. The correct answer is selected by clicking the pointer to the correct number button. There is all in the range one to ten.

Another neat touch is the ability to exit the game at any point, in which case the score is given as a total of correct answers out of the number attempted.

In common with other Thomson titles, the presentation is bright and cheerful. Registration costs between 10 and 20 dollars - you decide what you think it's worth.

Wesley Lee



ALTA LISTA V1.6

Utility

Freeware, all Atari

Alta Lista is a catalogue utility programmed by the late Doug McArthur for HomePage Progenix software.

After setting up sources and first location descriptions, Alta Lista automatically generates a series of HTML-format pages. The two useful pages created are:

- Alta Lista: a list of all HTML, image and text files
- Alta Graphics: an image catalogue page

The Alta Lista page includes a link to every image, text and HTML file. Clicking a link to an HTML file opens a Description page which includes a brief description of each file extracted from the first few lines of the body text in each file - just like the popular Alta Vista search engine on the Internet.

The Alta Graphics page generates a table displaying thumbnail sized images of all images in the source directory. Each thumbnail image is a



link which can be selected to display the full size image - an ideal tool for browsing and cataloguing CD-ROM collections or building up an image database online.

then "remember" ability and elevate Alta Lista from useful to indispensable. UK support via CyberTrider.

Jon Connor



Wesley Lee



70%

What I wondered what AT&T did was: thank you Alta Graphics!

Alta Lista can optionally create "buddy" icons to provide rapid HTML and image access on the web site pages, which can optionally include frame support.

This release only examines files in the root of the selected source directory - any subdirectories are ignored, which limits its usefulness. Hopefully a future release will add



MagiC

MagiC v5.51 rev 15.07.1996

Copyright 1996

© 1996 by Harvey Madsen,
Last & 4th Floor Suite

LAST & 4TH FLOOR SUITE

200 West 10th Street, Suite 400, San Francisco, CA 94103



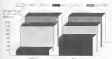
MagiC

Installation is performed using a custom install utility and includes a full page 45-line manual which will get you up and running fast in about an hour.

Other Genres, which replaces just the MS-DOS part of EMM, MagiC is a complete operating system which requires on a double boot to install itself into memory. MagiC includes its own compact alternative to the built-in desktop, called MagiDesk, which outperforms the TOS desktop. If you need a more fully featured desktop you can install a replacement desktop in the UK MagiC UserPC, comes loaded with icons. The alternative desktop thing is also popular and Novell's it also works, although it appears it still changes and not totally at home in the MagiC environment.

Task switching is performed by clicking on a blank part of the menu bar to the left of the menu items which displays a hidden popup menu showing the list of live windows available along with options to switch tasks, an idle running processes window, and search programs. A window option can be up to seven overlapping, but there is no way to remove a live window pointer. MagiC totally looks to be 32-bit high resolution (256 colors is not supported) but needs MAGI.DRV, a configuration file which sets windowable options.

The first Falcon compatible MagiC window task open to appear and seems a bit different, at any of the Falcon's main window. I got the impression the window effects are somewhat different.



Configuration is very simple, adding MAGI.DRV which is loaded on the fly and at least the manual offers some guidance although there is nothing new enough.

MagiC is modular and only loads utilities when they are needed. You can even replace the ones supplied with alternatives if you prefer. For example, RedBox can be off to instantly take over disk operations

Since MagiC is Windows 3.0 VxD (long) libraries up to 4.0 speed over extensions including spaces are supported which is useful for anyone taking work home from the office and Internet users, where long libraries are increasingly commonplace.

Early match?

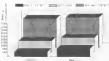
A Genres installation without a desktop or 32-bit only requires 400 Kb compared with 140 Kbytes for a MagiC installation so it naturally is a genuine Genres step in the future.

However, adding VxDs and Novell's to Genres keeps the total memory requirement up to 1200 Kb compared with 250 Kb for MagiC VxDs.

With VxDs installed on both systems they both run in almost identical ones of Genres' master MagiC is better on most graphics functions compared with generally faster processor efficiency in Genres.

Both systems perform their primary task of maintaining well although MagiC is probably the older package. For example if you start a file listed in an application already running Genres will launch another copy of that application, MagiC attempts to load a message in that application to load the second file.

Under Genres viewing the file simultaneously results in the copies of the file running whereas MagiC only opens a single copy, which isn't memory efficient.



Genres also has a VxD option, rather than memory, for the multi-task applications which can run concurrently but there is an upper limit of 256 windows. MagiC, it appears, up to 128 applications (including desktop accessories) up from 256 (previous version) with a maximum of 128 windows. Other programs may have their own internal limitations but this doesn't affect the system globally.

Genres can install more than six desktop environments which basically is built into a system where the most for disk environments is distributed because of the multitasking environment.

I only need a desktop accessory simply to find it, but it, then, has it, for the entire Internet network to the desktop and use that instead.

The MagiC manual informs us that accessories are necessary for the philosophy of multitasking, but includes several utility VxDs, modules which need the VxDs desktop accessory or alternatives to call. Accessories have also been an integral part

of the evolution of the Amiga platform and some programs, such as RedBox. That's why some, so on require desktop accessories to make the most of them. Accessories, and the RedBox and Internet, are the key using both systems.

Window management

It can be slightly disappointing at first to find window desktop access is different, perhaps on access at the same time and although you soon get used to it both MagiC and Genres offer ways of managing on window-client. MagiC's File function moves windows of windows, maintain the window area, which contains a few programs (which and the spring to mind) that of the time it works which means the programs continue to be happy on the right. Genres's Sleep option is similar and both packages support multitasking which also helps to reduce a better.

Summary

If you're light on memory or need multitasking compatibility Genres is the way to take. Unfortunately Genres employs very little support from programmers.

MagiC is an in a new relation written by Genres programmers and as a consequence is well supported by other Genres authors. It was seen as 32-bit equipped with any VxDs version below 2.50 not effectively get a 32-bit upgrade. There is some growing collection of detailed solutions parts as the Genres

Platform Application
Main Menu and the
Windows list window
Screen

For Falcon owners the choice has a clear cut. MagiC is the first of version to be Falcon compatible and it seems to me MagiC 5 has been one of the best but some have appeared to be later than that. The one you like to install second effects

Just on, noted earlier you'll find the window window in the menu and would prefer Genres to be the most stable of the two systems you use Falcon.

In relation to the last I find it difficult to find I made up my mind and both systems really on my first drive ready to be selected from Sleep at boot time. Currently my choice is MagiC, but a couple of weeks ago it was Genres and by the time you read this it could be Genres again. Whatever case I use I was some buyers of the other I had hoped the version in it early programs would help me see the desktop but finding it a part made things worse, being on version 5.0.

AVAILABILITY

Genres release 5

OS, distributed on 3.5in Disks or 3.5in CD-ROM

Price: £19.95 (US\$29.95) (US\$29.95)

Cost: \$19.95 or \$29.95 with Novell

MagiC 5

OS, distributed on 3.5in Disks or 3.5in CD-ROM

Price: £19.95 (US\$29.95)

Cost: \$19.95 or \$29.95 with Novell

Cost: \$19.95 or \$29.95

Creative Calamus

by George Bradford



THE ANATOMY OF TYPE

While we all use our Calamus fonts as a daily basis, very few of us stop to consider what is behind this miracle of instant type. In the days of hot metal type a font referred to a single point size of a specific style of type. A font in today's technology consists of data for numerous character sets, none of which are point size sensitive.

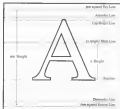
Each character of the font you are using was painstakingly designed, drawn, and layed down as an outline so that your computer could call on that shape to produce the real character you see on your output. Many of the early computer font outlines were designed with either multiple components or too many points. Both of these bad habits were soon discovered by users, and the cry went out for clean contiguous outlines with a minimum of points.

The first point is a character the faster it will display. Too many curve points are definite memory bogs, and sometimes points along a straight line are simply wasteful. If the character has been properly designed there should be no overlapping segments showing when you convert to path or give an outline command. Many of the earlier and cheaper fonts were built with numerous sub-points components like corners add on serif and cross bars, which give disastrous results when converted to path objects, for use in Outline Art.

Having worked on the type trade the better part of my life, I would like to try and explain the origin of the "x-height." In hand-set hot metal type the "x" was originally a metal space square, which was equal to the height of the point size and usually the width of the cap M. Each type character sat on this height, with clearance above and below, and the width varied depending on the letter's width, plus a shoulder on either side for clearance with adjoining characters. Above the character there must be room for ascenders, and to achieve solid leading between lines. The space below is needed for lower case descenders, and other characters which reach below the baseline, in g (/ j) .

The undercarriage on either side of metal type were straight with a fixed body width, and true custom kerning was almost impossible. With digital type the designer can determine how closely certain characters overlap, such as a sloping A with a W, and build this into his font.

The type designer has access to a complete character table, and places the proper character in the proper place so that when you strike the "a"



key, you get a lowercase "a." The standard QWERTY keyboard is flexible to all of us and supports the everyday characters we use, plus the space bar. However, the standard character table also contains all the foreign accented characters, bullets, em dashes, You ams, and any other character the designer chooses to include. It holds 256 definable characters, and you can access these special characters by accessing the ABC "Character Set Overview" menu. However, you will find that many of the lower grade fonts do not include these extra characters, so choose wisely.

The "x-height" in any typeface is the height of the lowercase letters as compared to the height of the capital letters. Typically this is the distance from the waist line to the baseline. A typewriter may have a small, medium or large x-height. The term "x" height was chosen since the letter "x" in most fonts usually best represents the lowercase x-height best, since many of the other curved lowercase characters tend to protrude slightly above and below the waist and baseline. If you look closely at specimens of your various typefaces you will see slight variations in the x-height. The reason for larger x-height is usually for better legibility in display type. Antique Olive is a perfect example of a font with large x-height, with Redrum and Petrus representing small x-heights.

Finally, the designer also creates a "Font Label" which allows you to see which fonts you have loaded into the Font Menu. That font label can have a simple bitmapped name in it, or it can be dressed up by creating a bitmapped version of the font, so that it is easier to recognize. These font labels are loaded into the Calamus font menu in the order they are chosen, thus the third font you load will always appear third on the menu listing.



EMBOSSSED TYPE

As various Calamus users we are always searching for new and different ways to display type, and one of the simplest, yet most impressive is the embossed effect. This can be either the simulation of raised (a low relief) or recessed (negative), and for two are so similar that the eye may sometimes be back at the same time depending on how the mind interprets the image. For the moment we shall assume that raised type is the effect we are looking for, and the following examples will be examined step by step.

EMBOSS:

First create a 30% background rectangle as big as you want. Using a fairly bold typeface, set the word at black. Now copy it twice (Alt-C) and change one to opaque white and the other to 30% grey (using the 'Style Menu', bottom right icon on the 'Font Size & Style Menu'). Place the white type on your grey rectangle first, and then the black type, with it offset slightly to the right and down a bit, then the grey type is centred vertically and horizontally over these two so that white shows on the left and top, and black shows on the right and bottom. If you find it difficult to select and move the 3 components, use 'Place to back' (Alt-B) to remove the layers from front to back as you position them. You could also drag your frames out in different directions to enable you to access the different layers, and then tidy them up later.



For very fine movement you would be wise to use the X and Y coordinate display (top right) and leverage your mouse.

TYPE:

This is a much simpler and less effective way of getting a raised effect. A 50% background, black type, and a 25% grey copy placed over it, offset to the right.



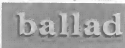
TARTAN:

Then various uses several tone values and type sizes to achieve a raised effect. The background shape is a 62% grey, and on this surface we place two layers of type. The bottom type is 67 point, white with a 25% outline of 20 point thickness, and 4.0 point letter-spacing. The top layer of type is 60 point with zero letter-spacing, a 62% fill and 2 point 88% outline. In this effect the 67 point lighter type is allowed to hang out on the left side to achieve a graduated effect shoulder.



BALLAD:

Set in 66 pt Cherry Baskerville Bold, this is a stacked series of the same size word on a 50% background. The bottom one is 62%, with the middle one 48%, and then topped off by a 35% version. Each of these is slightly offset to the right to create a raised, and almost graduated effect.



As I mentioned, when exact placement of type over type is required, you would be wise to utilize the X/Y coordinates shown in the top right corner of your screen. With this feature you can save the coordinates of the type's position, and then position another copy of it by watching these coordinates. Naturally, you can type in your desired coordinates and hit return to repetition of your type.

From what you have seen here it will be obvious that there are numerous ways to create the raised effect, and if you experiment you will most certainly find your favorite version. However, keep in mind that the best typelists for the embossed effect are the plain, broad, bold or blocky ones. With these you tend to get more flat surface area showing, and this accentuates the raised effect. You should also consider your final output device, whether it be an imagewriter, laser printer, or dot matrix. Each of these will give better or poorer results, so choose the proper raster screen value to suit the output device.

A New version from a New Distributor

SL Upgrade or Re-Birth?

Here's the reason why you're reading this: you just want the latest news for those waiting Calamus. Here's who are considering an upgrade.

MGI Software Corporation, the Canadian company who led the 1992/93/94/95 path, is on the point of releasing an English version of the long-awaited Calamus SL96 upgrade. The production of this major upgrade has been brought about by the arrival of a new development team who have been hard at work bringing a new feel to the latest version of Calamus by including a lot of up-to-date features.

X By far the most significant aspect of this version is MGI's inclusion within the basic package of most of the latter's optional modules. These include Unit Art 10, Soundtracking, Mark, Tables, Manual and the External Clipboard modules. Yes, that's right, all included in the basic package!

X There are several refinements to the user interface including style dialog boxes and menu bars (see table).

X The Mark functionality is now incorporated in the program and this eliminates the need for a separate Mark module.

X A new Exhibition Module provides comprehensive control over guidelines, grid lines and margins, frames, their number, placement and the colour gradient of help screens.

X A NEW text focus finding feature enables the user to proportionally adjust the text size within the frame by dragging the corner of the text frame.

X A NEW frame background feature which allows the user to include many types of background within a text frame.

X A NEW feature allows text frames to have their own margins. This has been designed to be used in conjunction with the Background feature previously mentioned.

X Several new 'Import/Export' features have been added, allowing users to add additional through imports such as: Bookmarks, Page CD Imports, Photoshop EPS (Import/Export), Windows BMP (Import/Export) and PNG Import/Export.

CALAMUS[®] 96

Introductory Price
£ 179.00
Inc. P&F and VAT
*This offer is valid from
May 31st until August 30th
Normal Retail Price £ 199.00*

Upgrade to CALAMUS[®] 96

SL92/93/94/95 to SL96	£ 129.00
5/52 to SL96	£ 139.00
L09/L09a to SL96	£ 159.00

Starting to read the text that Calamus 96 now includes might provide which need to be available only as extra cost these upgrade prices are lower when these are.

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QUESTIONS & ANSWERS

Time To Crash

Q Does time limit software, the Magic Timeslice, I get a crash and an alert box reports "XXXX exception error" why?



A This happens with a number of programs under Magic! The solution is to disable timeslicing during booting. This is achieved by reformatting and the C:\TL file is RACED.BT (add a character at the start of the file using any ASCII editor). Once all the drives are free (FAT-32, CFS, and some proprietary multi-tasking on which the timeslice timeslicing. You only need to do this the first time after editing RACED.BT and it solves these problems for good.

Harry Nelson

External File Systems

Q I recently came across a reference to loadable filesystems, and was told there can be used on my Atari ST. Now I do not consider myself to be a beginner when it comes to all matters, but this is the first time I have found a loadable file system. I have a 640 Kfile with 320MBs hard disk. Please explain what loadable filesystems are, and how I could use one up.

Pavel Oros, Warszawa

A The TOS filesystem (TOSFS) is adequate for most tasks you are likely to carry out. It takes care of things such as file attributes and does things like file structure on disk but does not support long filenames and other features which are becoming increasingly required for online use. A loadable filesystem replaces TOSFS offering enhanced features. The main filesystems available are:

- FFS filesystem (FATFS)
- Minix filesystem (MinixFS)
- HAM filesystem (HAMFS)

CIFS supports the DOS/MS filesystem standard used on most PCs. HAMFS is a dynamically extensible HAM disk and MinixFS is the most commonly used. MinixFS offers:

- Long filenames up to 64 characters in any mixture of upper and lower case including spaces
 - Links for symbolic and hard links (file access control)
 - Files can be assigned ownership attributes under a multi user system
 - Hard disks can have huge partitions without formatting the sector size
 - Faster and more robust than TOSFS
- All these filesystems are free, available from FFS/Minixware libraries and other sources. There are always you need to be aware of:

- Requires MMT or HighTOS
- Incompatible with TOSFS needs separate disk/partition
- Disk utilities designed for use with TOSFS such as diskmanagement utilities do not work with Minix disks
- Many non-MMT (usually older) programs are not able to access files with long filenames



• Freeware displaying long filenames installed under MultiTOS on a Minix partition

Installing the filesystems is straightforward. I cannot emphasize how important it is that you backup your hard disk before installing this. If you're not confident create a Minix filesystem on a floppy disk before doing your data! Here is a step by step guide to installing a MinixFS on your hard disk.

1. From the MinixFS distribution disk or MMT/FTP and enter the following parameters: V=1 J=1 A.

This creates a filesystem on drive A, supporting filenames up to 30 characters a disk partition. This avoids disk problems if you mistakenly copy files from a TOS partition to a Minix partition.

2. Put MINIXFS.DOS into either C:\MMT or C:\MSD\TTTOS where C is the boot partition. If you have HighTOS installed use C:\HAM\TTTOS.

3. Reboot with MMT/HighTOS and you should be able to use the MinixFS partition.

Derek Shotton

PG Readers

Q Is there any way to save a PC screen on my Atari? My screen and damaged crystal start screen want to crash.

Markus Guedert, London

A You can still be an Atari specialist mouse from Atari dealers. They have released and are generally more to use than the original. These typically run between \$10 and \$15.



Following on from your query on the US Windows Registry Viewer 32.0 Modem is SCSI. There is a need to wait for Windows to program some sort of device phone call by computer.

- The registered version of LoadIt supports the 286/5 voice modems and TOS/TLN 3 standard modems. The Registerer adds the 286/5 machine giving you the opportunity to record your own messages through the "no mail" option to long it
- Your serial interface supports 286/5 board
- You set up the recording directory yourself
- You 286/5

Peter Seng, Ireland

It is possible to use a serial PC modem plugged into the serial port along with a PC utility exclusively called Modem v2.5. It works well but doesn't do exactly the same as a standard modem. Obviously if you're already using the serial port for a modem this isn't a feasible idea.

Phil Hough

SCSI Modemless

Q Why does my Falcon hard disk keep locking up? The internal 40MB Quantum internal Modem hard disk keeps locking up with the message "Your host device is not receiving data" this installing HD Driver and my Falcon has all the statistics made that.

Copied a file from C:\D to C:\ on an old. Sometimes direct to disk copying will work other than I want it. When at all I start a restoring and go to bed, then get up in the morning to find POW on this 3 displaying that disk alert. ARGH!

Scott Rasmussen via CW

A SCSI lock ups do seem to afflict Falcon owners more than other modems, although other modems can be affected. The problem generally seems to get worse if you load the system with an unbuffered startup media a large volume partition.

If you have a copy of Kickoff (or Super) run the Zero Check utility and check each SCSI partition against disk to verify correct resolution you currently use (1, 16 and 64 colours). If you get a problem or suspect it is any of these then there needs to be a SCSI problem.

- Possible causes
- SCSI termination: Whatever you've read SCSI termination rules are made to be broken. Experimented to see you're wondering the Falcon is terminated internally on the mother board
- Try disconnecting any other SCSI devices
- Try substituting a different SCSI cable the shorter the better rule applies
- Run it means at the lowest practical resolution for the 16MB board
- The hard disk driver software and buffer method employed by individual applications is crucial. Programs which buffer data in large chunks (such as DOS software) are more prone to lockups. Try changing your hard disk driver software as follows
- If you're using 2.0-3.00 (other or any AHD version other than 4.00)

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